

# PC and Enterprise Hardware Initiation

## "Bring Your Own Devices" BYOD Trend Grows Bigger To Challenge Traditional PC Growth

- **Tech Hardware Call** — We are initiating coverage of the IT Hardware industry with A uniquely contrarian view. BYOD (Bring Your Own Device) started in the handset segment. We see this trend evolving to the enterprise PC area and becoming a very disruptive force in the years ahead. Traditional PC makers such as Dell & HPQ appear to be at most risk while full end-to-end service providers such as IBM could see the best opportunity. Enterprise storage (EMC & NTAP) may benefit but need more healthy IT spending.
- **Non Consensus Sector View** – Working as a global team, Citi's Investment Research global PC model is materially below consensus. We forecast a decline of -1% in 2013 (desktops down -1% & notebooks flat) materially below industry forecasts of +7% growth. Our non consensus PC view is driven by a staggering 59% growth for tablets (Apple the primary seller in tablets) & BYOD.
- **Top Buy Rating** — Our top Buy-rated stock is IBM with a \$250 target price as we see IBM's strong earnings visibility with double digit EPS CAGR expected through 2015, an impending mainframe cycle, strong services & a beneficiary of BYOD.
- **Top Sell Ratings** — Our Sell ratings on HPQ & Dell are non consensus which have 82% / 94% buy+hold ratings on each stock. We believe forward estimates are materially too high for HP & DELL & we model at least 10%-15% below consensus EPS. We believe BYOD to the enterprise will be a material headwind to HP & Dell as well as Lenovo share gains.
- **Neutral Ratings** — Among the list of Neutral 2 rated stocks as shown below, the enterprise storage sector (EMC & NTAP) has the most favorable industry dynamics in our opinion, but we believe a more healthy IT spending & employment environment is needed to drive upside to estimates. But we are skeptical of a 2012 year end budget spending flush thereby setting up for our cautionary near term view. Nokia is at a crossroads of a new Microsoft platform launch with an extremely negative investor sentiment placing the stock as a Neutral for potential short covering & an eye on traction for the new products (Q4 launch).

**Jim Suva, CPA**

+1-415-951-1703

jim.suva@citi.com

**Ashwin Shirvaikar, CFA**

+1-212-816-0822

ashwin.shirvaikar@citi.com

**Joe Yoo**

+1-415-951-1688

joe.yoo@citi.com

**Asiya Merchant, CFA**

asiya.merchant@citi.com

Company	Ticker	Rating		Target Price		Current Year Earnings Estimates	
		Old	New	Old	New	Old	New
Dell Inc	DELL	NA	3	NA	US\$8.50	NA	US\$1.74
Electronics Imag	EFII	NA	2	NA	US\$18.00	NA	US\$1.20
EMC Corp	EMC	NA	2	NA	US\$30.00	NA	US\$1.70
Hewlett-Packard	HPQ	NA	3	NA	US\$13.50	NA	US\$4.05
IBM	IBM	NA	1	NA	US\$250.00	NA	US\$15.18
Ingram Micro Inc	IM	NA	2	NA	US\$17.00	NA	US\$1.79
Lexmark Intl	LXK	NA	3	NA	US\$18.00	NA	US\$3.60
Nokia	NOK1V.HE	2	2H	€1.80	€2.12	€-0.20	€-0.38
NetApp	NTAP	NA	2	NA	US\$34.00	NA	US\$2.05
Synnex Corp	SNX	NA	2	NA	US\$35.00	NA	US\$3.86
Tech Data Corp	TECD	NA	2	NA	US\$48.00	NA	US\$5.21
Xerox Corp	XRX	NA	2	NA	US\$8.00	NA	US\$1.06

See Appendix A-1 for Analyst Certification, Important Disclosures and non-US research analyst disclosures.

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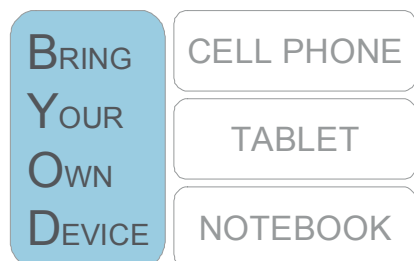
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## Portfolio Manager Summary

Citi is taking a uniquely contrarian view of global technology by connecting the dots from the technology supply chain into technology hardware. In doing so we highlight four new emerging trends:

Figure 1. What is BYOD?



Source: Citi Research

1. BYOD (Bring Your Own Device) has been focused on handsets during the past 4 years but this is likely to change to now include PCs. This will greatly impact corporate PC sales and slow down the PC replacement cycle while allowing employees to choose their own computing devices and introducing alternatives to the traditional Dell and HP corporate footprint. This leads to our materially below consensus Global PC model and negative stock calls on Dell & HPQ (both Sell rated),
2. True enterprise services (IBM) vs. pseudo (DELL & HPQ) enterprise services to more clearly manifest their strengths and weakness.
3. Enterprise storage sees favorable content consumption & BYOD drives more cloud storage but IT spending and employment trends currently not favorable,
4. Imaging sector facing structural declines by the adoption of tablets and BYOD while industrial and services provide an avenue of relief.

Accordingly our top stock picks are Buy IBM, and Sell both HPQ & Dell.

**Special Note:** Our Supply Chain Handbook serves as a reference guide enabling investors to gauge the impact of incremental data points as it relates to specific companies within key technology sectors. In the latest edition, we provide a high level overview of each company's supply chain, mapping key suppliers, customers, competitors, geographic exposure, operating segments and competitors for 149 companies. With these diagrams, investors can connect the dots to see how data from one or more companies can affect others. Our universe covers semiconductors, semi equipment, PCs, server & storage OEMs, consumer electronics, cellular devices, telecoms & data communications equipment, electronic manufacturing companies, and alternative energy. The report can also be found at this link: [Global Technology Supply Chain Handbook](#)

## BYOD and Why It Matters

Most are aware of the past events over the past 4 years of the BYOD trends that have been very disruptive to the handset industry where Research in Motion lost its dominate grip with enterprise customers as BYOD enabled employees to Bring Their Own Device (BYOD). While security is always a concern for corporations, we note a myriad of security solutions which protect the enterprise while empowering employees to select their own devices. Examples of these software solutions include IBM, SAP, Citrix, Good Technology, Mobile Iron, NQ Mobile, etc. Examples of corporations testing or rolling out BYOD to the enterprise PC users include Kraft Foods, Procter & Gamble, Citrix and Carfax. Our studies have found BYOD typically first starts with cell phones then gradually folds into tablets followed by PCs. At its most basic level, even simple tablet adoption is likely to lengthen the enterprise upgrade cycle as employees use their standard desktop/laptop less while at the other extreme, BYOD adoption throughout the total hardware of an enterprise would introduce non traditional PCs such as Apple, Lenovo, Acer, and China white box PC suppliers.

**We recognize that investor sentiment for PC demand is cautious at the current time but we do not believe investors are aware of the future negative impact of BYOD to the enterprise PC replacement cycle.**

With the help of our Asia research colleagues (Kevin Chang, Jonathan Gu, & Wei Chen in Taiwan, Henry Kim in Korea, Kota Ezawa in Tokyo, Glen Yeung in the US) we believe future PC forecasts are too optimistic, as these PC alternatives coupled with tablet traction will likely lengthen the enterprise replacement cycle and potentially be disruptive for DELL and HP. Accordingly, we are modeling a decline of -1% in 2013 for desktops + notebooks compared to industry expectations of +7% growth. This theme has a very extensive far reaching effect not only on the PC makers but also on enterprise service providers, enterprise storage, and the imaging sector as shown below.

**Figure 2. Impact from BYOD on Companies**

	Positive for Stocks	Negative for Stocks
Traditional PCs & Tablets	Apple, Microsoft (potentially if Surface and Windows 8 success), Lenovo, PC white box makers, IBM (middleware & device management)	Dell, Hewlett-Packard, Tech Data (TECD), Ingram Micro (IM), Synnex (SNX)
Enterprise Storage	IBM, EMC (EMC), NetApp (NTAP)	Seagate (STX), Western Digital Corp (WDC)
Printing	Apple, Microsoft (potentially if Surface and Windows 8 succeed)	Xerox (XRX), Hewlett-Packard (HPQ), Lexmark (LXK), Electronics for Imaging (EFII)

Source: Citi Research

**Overall, Expectations for 4Q Sales Growth Estimates Are Not Set At a High Bar So Downside Risk To Q4 Estimates Remain Limited but we believe 2013 estimates are too high for PC companies (HPQ and DELL).**

**Figure 3. 4Q Sales Growth Q/Q vs. Seasonal Norms**

	4CQ12 q/q growth (Consensus estimate)	4CQ q/q Seasonality (5-year historical avg)	4CQ q/q growth (5-year high/low)	Risk to 4CQ12 Estimate	Comments
IBM	16%	15%	+20% / +7%	Low	Risk of weak budget flush; but 2/3 of revenues are recurring; potential mainframe refresh is a catalyst
DELL	4%	3%	+11% / -16%	High	Risk of BYOD & weak budget flush; further softening of PC demand and share loss
HPQ	-4%	-4%	+1% / -14%	High	Risk of BYOD & weak budget flush; further softening of PC demand; continued printer inventory issues
EMC	13%	14%	+16% / +8%	Medium	Risk of weak budget flush
NTAP	5%	7%	+12% / -4%	Medium	Risk of weak budget flush, competitive intensity, but below-seasonal expectation
IM	12%	14%	+19% / +5%	Medium	Risk of BYOD & weak budget flush; softening of consumer demand; Brightpoint integration
TECD	9%	7%	+15% / -7%	High	Risk of BYOD & weak budget flush; softening of consumer demand; street looking for above-seasonal revs
SNX	10%	10%	+13% / +2%	Medium	Risk of BYOD & weak budget flush; softening of consumer demand
XRX	8%	9%	+13% / 0%	Medium	Risk of BYOD & weak budget flush and structural printing decline
LXK	2%	6%	+12% / -4%	Medium	Risk of BYOD & weak budget flush, business restructuring; but low 4Q expectations
EFII	11%	5%	+13% / -6%	High	Risk of weak budget flush but offset by secular growth drivers in production printing (analog to digital)
NOK	14%	16%	+23% / +3.5%	Medium	Concern over Product Launches & Windows Phone adoption, further share loss; but below-seasonal expectation

Source: Citi Research

## How We Differ From Consensus

Our Buy rating on IBM and Sell ratings on both HPQ & Dell are non consensus.

Figure 4. Citi vs. Consensus Ratings & Target Prices

	Consensus			Target Price	Citi	
	% Buy	% Hold	% Sell		Rating	Target Price
IBM	40%	60%	0%	\$ 216.74	Buy	\$ 250.00
HPQ	25%	53%	22%	\$ 18.64	Sell	\$ 13.50
DELL	43%	51%	5%	\$ 13.84	Sell	\$ 8.50
EMC	95%	5%	0%	\$ 31.72	Neutral	\$ 30.00
NTAP	39%	58%	3%	\$ 37.77	Neutral	\$ 34.00
NOK1V-HEL	15%	42%	44%	€ 2.11	Neutral	€ 2.12
IM	15%	77%	8%	\$ 17.90	Neutral	\$ 17.00
SNX	56%	44%	0%	\$ 38.00	Neutral	\$ 35.00
TECD	30%	50%	20%	\$ 52.25	Neutral	\$ 48.00
XRX	36%	55%	9%	\$ 8.31	Neutral	\$ 8.00
LXK	8%	42%	50%	\$ 19.43	Sell	\$ 18.00
EFII	100%	0%	0%	\$ 21.00	Neutral	\$ 18.00

Source: Citi Research and FactSet

We are materially above consensus for IBM and materially below for HPQ, DELL & LXK for both sales and EPS.

Figure 5. Citi vs. Consensus Sales & EPS CY2013

CY2013 Sales (M)					CY2013 EPS				
Ticker	Consensus	Citi	Absolute Difference	Percentage Difference	Ticker	Consensus	Citi	Absolute Difference	Percentage Difference
IBM	\$ 108,103	\$ 111,631	\$ 3,527	3%	IBM	\$ 16.73	\$ 17.91	\$ 1.18	7%
EMC	\$ 24,367	\$ 24,005	\$ (362)	(1%)	EMC	\$ 1.97	\$ 1.91	\$ (0.05)	(3%)
HPQ	\$ 115,447	\$ 114,582	\$ (865)	(1%)	HPQ	\$ 3.71	\$ 2.60	\$ (1.12)	(30%)
DELL	\$ 57,267	\$ 54,963	\$ (2,304)	(4%)	DELL	\$ 1.77	\$ 1.58	\$ (0.19)	(11%)
NTAP	\$ 6,830	\$ 6,657	\$ (173)	(3%)	NTAP	\$ 2.38	\$ 2.31	\$ (0.08)	(3%)
XRX	\$ 22,912	\$ 22,797	\$ (116)	(1%)	XRX	\$ 1.14	\$ 1.10	\$ (0.03)	(3%)
IM	\$ 36,858	\$ 37,385	\$ 527	1%	IM	\$ 1.98	\$ 1.92	\$ (0.06)	(3%)
TECD	\$ 25,598	\$ 25,325	\$ (274)	(1%)	TECD	\$ 6.21	\$ 5.99	\$ (0.22)	(3%)
LXK	\$ 3,433	\$ 3,081	\$ (352)	(10%)	LXK	\$ 4.06	\$ 3.46	\$ (0.60)	(15%)
SNX	\$ 10,661	\$ 10,262	\$ (399)	(4%)	SNX	\$ 4.07	\$ 4.15	\$ 0.09	2%
EFII	\$ 689	\$ 690	\$ 1	0%	EFII	\$ 1.38	\$ 1.37	\$ (0.01)	(1%)
NOK	EUR 29,393.74	EUR 29,232	\$ (161)	(1%)	NOK	EUR (0.07)	EUR (0.07)	\$ 0.00	(2%)

Source: Citi Research and FactSet

Citi Research uniquely covers the IT Hardware and Technology Supply Chain under one analyst, Jim Suva, with joint coverage of IBM with Ashwin Shirvaikar (business services). Importantly Citi's research is global with Asia and Europe contributions as well as shown in our global PC model. Below shows this new coverage footprint.

Figure 6. PC & Enterprise Hardware coverage: IT Hardware + Technology Supply Chain

### Jim Suva: IT Hardware and Technology Supply Chain

IT Hardware								Technology Supply Chain							
Ticker	Market Cap (\$M)	Target Price in Local Currency	Last Price in Local Currency	Div Yield (%)	Expected Total Return (%)	Rating	Risk	Ticker	Market Cap (\$M)	Target Price	Last Price	Div Yield (%)	Expected Total Return (%)	Rating	Risk
<b>Tech Hardware</b>								<b>EMS Companies</b>							
IBM	\$240,565	250.00	210.51	1.4%	20%	Buy		BHE	\$868	14.00	15.46	0.0%	-12%	Sell	
Hewlett Packard	\$29,315	13.50	14.91	3.5%	-7%	Sell		CLS	\$1,630	7.00	7.12	0.0%	-3%	Sell	
Dell	\$16,357	8.50	9.43	3.3%	-9%	Sell		FLEX	\$4,013	7.00	6.03	0.0%	15%	Neutral	
EMC Corp	\$56,749	30.00	27.04	0.0%	9%	Neutral		Jabil Circuit	\$3,723	23.00	18.12	1.8%	29%	Neutral	
NetApp	\$11,397	34.00	31.37	0.0%	11%	Neutral		Plaxus Corp	\$1,039	32.00	29.70	0.0%	6%	Neutral	
Motorola Solutions	\$14,573	51.00	50.90	2.0%	1%	Neutral		Sanmina-SCI	\$645	9.00	7.91	0.0%	10%	Neutral	High Risk
Xerox	\$9,373	8.00	7.17	2.3%	12%	Neutral									
Lexmark	\$1,486	18.00	21.13	5.5%	-13%	Sell									
EFI	\$767	18.00	16.49	0.0%	6%	Neutral									
<b>Distributors</b>								<b>Connector Companies</b>							
Arrow Electronic	\$3,718	46.00	34.17	0.0%	31%	Buy		APH	\$9,374	71.00	58.23	0.7%	22%	Buy	
Avnet Inc	\$4,002	42.00	28.57	0.0%	43%	Buy		MOLX	\$4,225	27.00	26.10	3.3%	5%	Neutral	
Ingram Micro	\$2,274	17.00	15.15	0.0%	10%	Neutral		TEL	\$14,563	37.00	34.04	2.4%	10%	Buy	
Tech Data	\$1,670	48.00	44.24	0.0%	8%	Neutral		Sensata Techn HI	\$5,288	30.00	29.77	0.0%	2%	Neutral	
Synnex	\$1,209	35.00	32.40	0.0%	6%	Neutral									
<b>Optical/Glass</b>								<b>Passive Companies</b>							
Corning Inc	\$19,923	12.25	13.38	2.2%	-6%	Neutral		AVX	\$1,588	11.00	9.38	3.3%	17%	Neutral	
<b>Mobile Devices</b>								Vishay Intertech	\$1,373	11.00	9.58	0.0%	12%	Neutral	
Nokia	\$7,662 H	2.12	2.05	4.9%	9%	Neutral	High Risk								
Research in Motion	\$4,225 H	5.00	8.06	0.0%	-40%	Sell	High Risk								

Source: Citi Research, Note: Pricing is as of mid day Oct 5

## Consumer & Enterprise Tech Hardware (PCs)

During the past 4 years BYOD (Bring Your Own Device) has been primarily focused on handsets. Looking ahead, we believe this trend will evolve into a much larger trend that will first embrace tablets and later notebooks/PCs both of which should have a negative impact on Personal Computers (PCs) and challenge the traditional employee / employer technology hardware relationship. Various forms of inception of this new trend are starting to emerge ranging from allowing employees to connect various hardware devices (smart phones, tablets, personal notebooks) including cloud based solutions. Some employers have even gone as far as providing monetary stipends to empower employees to select their computing device of choice (primarily small and mid size companies). While data security is always a concern, several alternative solutions are gaining traction (IBM, SAP, Citrix, Good Technology, Mobile Iron, NQ Mobile, etc). With BYOD we expect the consumerization of technology hardware to accelerate. We believe these trends have a positive impact for end-to-end software solutions (one of several reasons for our Buy rating on IBM) and a negative impact for traditional enterprise desktop/notebook providers (key reason for our Sell ratings on Dell & HPQ).

### Global PC Model

**We are materially below consensus on our PC forecast given BYOD and Tablet adoption with a big mix shift towards tablets and away from desktops and portables.**

With the help of our Asia research colleagues, we believe future PC forecasts are materially too optimistic. These PC alternatives coupled with tablet traction will lengthen the enterprise replacement cycle and potentially be very disruptive for DELL and HP who are the traditional incumbents in the enterprise workplace. Accordingly we are modeling a decline of -1% in 2013 for desktops + notebooks compared to industry expectations of +7% growth. We also point out that we are modeling a higher Tablet forecast.

Figure 7. Citi's Global PC Model Summary (detailed model available upon request)

	Citi Research		IDC as of 8/12		Comments
	Units (millions)	Y/Y	Units (millions)	Y/Y	
<b>2012</b> Desktop	152	(2%)	153	(1%)	2012 is over half way finished so accordingly Citi does not differ materially from IDC other than more cautious on Desktop & Portable computers but more positive on Tablets and more cautious on eReaders Mix shift to tablets helps total unit growth
Portable	209	(0%)	214	2%	
Total Desktop + Portable	361	(1%)	367	1%	
Tablets	119	68%	107	52%	
eReaders	18	3%	39	41%	
Total Units	498	8%	514	11%	
<b>2013</b> Desktop	151	(1%)	156	2%	Citi is more cautious on Desktop & Portable computers in 2012-2015 but more positive on Tablets and more cautious on eReaders Mix shift to tablets helps total unit growth
Portable	208	(0%)	235	10%	
Total Desktop + Portable	359	(1%)	391	7%	
Tablets	189	59%	143	33%	
eReaders	20	11%	49	26%	
Total Units	568	14%	583	14%	
<b>2014</b> Desktop	152	0%	159	2%	Mix shift to tablets helps total unit growth
Portable	219	5%	260	10%	
Total Desktop + Portable	371	3%	419	7%	
Tablets	269	43%	175	22%	
eReaders	23	17%	56	13%	
Total Units	663	17%	649	11%	
<b>2015</b> Desktop	151	(0%)	161	1%	Mix shift to tablets helps total unit growth
Portable	230	5%	289	11%	
Total Desktop + Portable	381	3%	450	8%	
Tablets	363	35%	200	14%	
eReaders	26	14%	59	6%	
Total Units	770	16%	709	9%	

denotes major investor focus items

Source: Citi Research and IDC



## Enterprise Storage

While we agree with the belief that looking ahead enterprise storage will continue to see favorable secular trends (content consumption, security, record retention, pictures and video, increased cloud usage, etc), we believe cyclical trends of unemployment and pressures on IT spending are near term challenges to the industry. Accordingly, we rate enterprise storage companies EMC and NetApp Neutral . We could potentially get more positive on these stocks if IT spending and employment trends improve and / or lower stock prices.

Contrary to the general belief of high revenue growth (high terabytes growth but rapid pricing pressure), the enterprise storage market posted only 2-3% annual growth over the past four years, inline to only slightly better than the 3% growth for overall global hardware spending. IDC estimates the enterprise storage market (hardware, software and services) was a US\$ 80Bn market in 2011 and is estimated to grow at a modestly higher pace of 5-6% CAGR through 2015E. The hardware and systems segment (representing ~40% of the total market at ~\$35Bn in 2011) is estimated to grow at the lower end of the range while storage services which also represent ~40% of total storage market are likely to grow towards the upper end of this range. Storage software, representing the remainder ~20% offers modestly higher growth rate at ~7% CAGR over the forecasted period.

Figure 8. Overall IT Spending (\$B) By Regions

IT Spending (\$B) Region	2007	2008	2009	2010	2011	2012	2013	2014	2015	2007 - 2011 CAGR	2011-2015E CAGR
United States	\$929	\$958	\$933	\$918	\$970	\$1,011	\$1,060	\$1,107	\$1,153		
yoy	5%	3%	-3%	-2%	6%	4%	5%	4%	4%		
Canada	\$74	\$77	\$72	\$77	\$83	\$85	\$88	\$92	\$95		
yoy	10%	4%	-7%	6%	9%	3%	3%	4%	3%		
Latin America	\$222	\$251	\$235	\$262	\$293	\$315	\$338	\$359	\$381		
yoy	17%	13%	-6%	11%	12%	8%	7%	6%	6%		
Western Europe	\$872	\$908	\$817	\$778	\$807	\$778	\$789	\$799	\$814		
yoy	10%	4%	-10%	-5%	4%	-4%	1%	1%	2%		
Central and Eastern Europ	\$148	\$174	\$140	\$135	\$146	\$151	\$161	\$170	\$180		
yoy	28%	17%	-20%	-4%	8%	4%	6%	6%	6%		
Middle East and Africa	\$192	\$206	\$204	\$211	\$228	\$238	\$250	\$263	\$276		
yoy	29%	8%	-1%	3%	8%	4%	5%	5%	5%		
Japan	\$273	\$307	\$314	\$325	\$356	\$350	\$351	\$356	\$363		
yoy	3%	13%	2%	3%	9%	-2%	0%	2%	2%		
Asia/Pacific	\$472	\$521	\$523	\$560	\$639	\$698	\$749	\$802	\$858		
yoy	16%	11%	0%	7%	14%	9%	7%	7%	7%		
All IT	\$3,181	\$3,403	\$3,239	\$3,265	\$3,523	\$3,628	\$3,786	\$3,948	\$4,119		
yoy	11%	7%	-5%	1%	8%	3%	4%	4%	4%		

Source: Gartner

Figure 9. Enterprise Storage Market (2007-2015E)

	2007	2008	2009	2010	2011	2012	2013	2014	2015	2007-2011 CAGR	2011-2015 CAGR
Enterprise Storage Systems	28.9	29.8	26	30.8	33.4	35.3	37.2	38.8	40.5		
YoY	3.1%	-12.8%	18.5%	8.4%	5.7%	5.4%	4.3%	4.4%	4.0%	3.7%	4.9%
Tape Automation	1.9	1.8	1.6	1.1	1	0.9	0.8	0.8	0.8		
YoY	-5.3%	-11.1%	-31.3%	-9.1%	-10.0%	-11.1%	0.0%	0.0%	0.0%	-14.8%	-5.4%
Storage Services	31.7	32.8	31.4	32.4	33.9	35.7	37.8	40.2	42.7		
YoY	3.5%	-4.3%	3.2%	4.6%	5.3%	5.9%	6.3%	6.2%	6.2%	1.7%	5.9%
Storage Software	11.2	12	11.6	12.8	13.7	14.7	15.7	16.7	17.8		
YoY	7.1%	-3.3%	10.3%	7.0%	7.3%	6.8%	6.4%	6.6%	6.6%	5.2%	6.8%
Total	73.7	76.4	70.6	77.1	82.0	86.6	91.5	96.5	101.8		
YoY	3.7%	-7.6%	9.2%	6.4%	5.6%	5.7%	5.5%	5.5%	5.5%	2.7%	5.6%
Overall IT Spending	3,181	3,403	3,239	3,265	3,523	3,628	3,786	3,948	4,119		
YoY	7%	-5%	1%	8%	3%	4%	4%	4%	4%	2.6%	4.0%

Source: IDC all Storage data and Gartner Overall IT Spending data

While storage consumption in terabytes is expected to grow 37% CAGR, we believe average selling prices should fall 24% (historically pricing has declines 30-35% but projected to not fall as fast given NAND adoption).

Secular trends driving demand for data capacity include digital entertainment, digital imaging, data analytics, data retention, data protection, and new cloud based enterprise solutions. Offsetting these drivers is the impact of storage solutions that boost storage utilization rates, optimize amount of data to be stored, and utilize various storage delivery models (ie, storage as a service public/cloud offerings). Net net, IDC expects storage consumption (in terabytes) to grow at ~37% CAGR. On the other hand, price/GB declines are also expected to moderate to ~23.5% CAGR, five-year CAGR compared with the historical 30–35% annual decline as the mix of

media types used in storage systems is leaning toward lower cost capacity-optimized hard disk drives, which are most impacted by price actions caused by HDD shortage, and increasing adoption of flash based storage carrying higher price per gigabyte.

From a topology perspective, end users are expected to spend on open network storage segments (+6.7% CAGR) and shift away from mainframe (-3.8% CAGR) and direct attached storage (-5.3% CAGR). The key drivers of this shift to networked storage are data center/server consolidation, server virtualization and an increased focus on improving storage utilization. Network-Attached Storage (NAS) is expected to slightly outgrow the Storage Area Network segment (SAN) given lower cost, easier deployment and support for multiple networking protocols, including Ethernet. Within networked storage, Fibre Channel SAN segment will remain the major segment, accounting for 42.6% of end-user spending by 2016, although it will be the slowest growing, at 3.3% CAGR. However, spending on Ethernet based storage, which includes Networked Attached Storage (NAS), iSCSI SAN, and Fiber Channel over Ethernet (FCoE), should surpass spending on FC SAN storage by 2015.

From a storage class and segment perspective, the entry level (systems that cost less than US\$ 25k) and mid range systems (systems that cost between \$25K - \$250k) are expected to grow at 7-8% CAGR while higher end systems (storage solutions that cost more than US\$250k) should continue to potentially decline at a slow pace of 2% CAGR.

Figure 10. Enterprise Storage Systems (2009-2015E)

REVENUES (\$M)	2009	2010	2011	2012E	2013E	2014E	2015E	'07-11	'11-15
<b>Total Factory Revenue</b>	<b>\$24,234.9</b>	<b>\$28,716.6</b>	<b>\$31,084.1</b>	<b>\$35,292.1</b>	<b>\$37,199.9</b>	<b>\$38,784.8</b>	<b>\$40,536.0</b>	<b>3.6%</b>	<b>6.9%</b>
DAS	\$3,332.9	\$2,898.3	\$2,597.9	\$2,589.3	\$2,476.7	\$2,322.1	\$2,215.6	(12.6%)	(3.9%)
ESCON / FICON	\$643.5	\$699.8	\$801.4	\$760.9	\$746.8	\$723.5	\$704.5	0.0%	(3.2%)
NAS	\$3,441.5	\$5,131.3	\$5,589.9	\$6,584.0	\$7,134.0	\$7,665.0	\$8,158.6	17.9%	9.9%
SAN	\$10,425.9	\$12,504.7	\$14,511.6	\$16,710.0	\$17,915.5	\$18,942.7	\$20,053.3	8.7%	8.4%
FC SAN	\$8,516.9	\$9,548.4	\$11,028.5	\$12,370.6	\$12,828.0	\$13,058.7	\$13,472.9	3.5%	5.1%
iSCSI SAN	\$1,740.4	\$2,536.4	\$3,032.1	\$3,701.5	\$4,248.0	\$4,692.6	\$5,031.5	40.9%	13.5%
Infiniband SAN	\$50.6	\$255.4	\$299.8	\$329.3	\$368.5	\$406.9	\$419.0		8.7%
FCoE SAN	-	\$23.2	\$17.4	\$146.2	\$273.7	\$553.4	\$860.8		165.3%
SAS SAN	\$118.1	\$141.3	\$133.7	\$162.4	\$197.3	\$231.1	\$269.1	66.7%	19.1%
<b>Total Open Networked Storage</b>	<b>\$13,867.5</b>	<b>\$17,636.0</b>	<b>\$20,101.5</b>	<b>\$23,294.0</b>	<b>\$25,049.5</b>	<b>\$26,607.7</b>	<b>\$28,211.9</b>	<b>10.9%</b>	<b>8.8%</b>
<b>Total External Storage Revenue</b>	<b>\$17,843.8</b>	<b>\$21,234.1</b>	<b>\$23,500.8</b>	<b>\$26,644.2</b>	<b>\$28,273.1</b>	<b>\$29,653.3</b>	<b>\$31,132.0</b>	<b>6.1%</b>	<b>7.3%</b>
Internal Storage Revenue	\$6,391.1	\$7,482.5	\$7,583.3	\$8,647.9	\$8,926.9	\$9,131.6	\$9,404.0	(2.6%)	5.5%

Source: IDC

### Market share analysis

EMC remains a market leader in the external enterprise storage segment with 28.5% share in 2011 (based on IDC), and it has been a consistent share gainer in this segment over the past five years (+690 bps of share). Acquisitions (DataDomain in 2009, Isilon in 2010) as well as renewed focus on internal products (VNX and VNXe) resulted in the share gains.

NetApp has also been a major share gainer over the past five years (+450 bps of share) in the storage segment given its focus on the high growth segments of NAS and mid range systems. Its current market share of 12.4% in 2011 ranks it as the third largest supplier in this segment.

The other large vendors are IBM (13.5%), HP (10.7%), Hitachi (8.8%), Dell (7.8%) and Oracle at (2.5%).



Figure 11. Networked Storage Revenue Market Share (2009-2011)

	2009	2010	2011
<b>Networked Storage Factory Revenue</b>	<b>\$13,867.5</b>	<b>\$17,636.0</b>	<b>\$20,101.5</b>
Y/Y Change	(8.3%)	27.2%	14.0%
Percent of Market	57.2%	61.4%	64.7%
<b>Networked Storage Market Share</b>			
EMC	27.6%	29.2%	31.9%
NetApp	11.5%	13.5%	14.6%
IBM	14.1%	13.4%	13.3%
HP	11.2%	10.1%	9.6%
Dell	8.2%	8.3%	7.2%
Hitachi	7.5%	7.7%	8.4%
Oracle	-	1.7%	2.7%

Source: IDC, Citi Research

## Distributors

Revenues for broadline IT distributors (under our coverage) have increased by an average of 4% during the past 5 years, slightly above the 3% for overall global hardware spending. We primarily attribute the outperformance to share gains through acquisitions rather than organic growth. While we believe sustainable growth could be in line with global GDP growth, we anticipate revenues to remain relatively flat for the next 1-2 years. This is mainly based on persistent macro concerns, particularly in Europe, with modest real GDP growth of 2-3%, and limited employment growth.

Revenue headwinds are also exacerbated by secular concerns over potential decline in traditional corporate PCs (and associated peripherals) and printer hardware. For commercial PCs specifically, the revenue opportunity is hindered by 1) increasing adoption of BYOD (bring-your-own-device) policy for workplace computing, which could result in longer PC replacement cycles, 2) a move toward virtual desktop infrastructure (VDI) where thin clients (with lower ASPs) replace the traditional PC.

Despite top line growth challenges near-term we do expect the group to generate earnings growth in the mid-to-high single digits over the next couple of year driven by 1) further margin expansion as the business mix shifts toward higher value-add businesses (eg. BPO, system integration), and 2) continued share repurchases. We remind that this is a trend that we started witnessing 5-6 years ago as the industry began to mature following a phase of aggressive geo expansion and M&A. With a more consolidated market, overall pricing became more rational and concurrently, businesses expanded into higher margin products/services, resulting in a more profitable industry. During the past 5 years, industry operating margins have expanded by more than 30bps (which is impressive when normal op margins are between 1-2%), which partly contributed to the +14% earnings CAGR despite a mid-single digit top line growth. Nevertheless, razor thin operating margins of 1-2% leave little room for mishaps and not as favorably positioned compared to other industries should the economy recover.

### Key Investment Themes

- **Growth through acquisitions** – Given the lack of growth in the IT hardware space, distributors are actively deploying their cash to acquire growth via M&A. We estimate that the bulk of the revenue growth within IT distributors (under coverage) during the past 5 years came from acquisitions. These are highlighted by Tech Data's acquisition of Nordic IT distributor Scribona (~\$1B in revs), and Netherlands-based value-added distributor Triade Holdings (~\$1.2B in revs). Synnex also added a combined >\$2B in annual revenues via the acquisition of consumer electronics distributor New Age, and Japanese IT distributor Marubeni Infotech. While Ingram Micro could add over \$5B in revenues through the pending acquisition of BrightPoint. Given that IT distribution is still a fragmented market, we expect further consolidation to fuel growth for the incumbent players during the next several years.
- **Embracing the channel** – When we look at optimal sales models for IT hardware vendors, it is clear to us that the broad-line IT distributor offer one of the most cost-effective and flexible way to sell products. It is true that the economics of a direct sales force makes sense when dealing with very large enterprise customers given the size of the purchases. However, the economics become less appealing when IT vendors deal with SMB customers (with 1,000 employees or less) where annual procurement volumes are modest. Within this market, IT vendors can effectively sell to these SMB customers by using a major broadline distributor, which leverage a massive customer network of value-added resellers. The added benefit is that there is limited opex related to selling through the channel, which offers a tremendous benefit to profitability particularly when demand slows. A major testament to this benefit is Dell finally embracing the

distribution channel (selling PCs through IM and TECD) in 2009 after struggling to maintain profitability within the SMB market.

- **Steady Improvement in ROIC** – During much of the last decade, distributors have struggled to generate ROIC above their cost of capital due to a combination of the competitive environment, poor product mix and inconsistent execution. However, ROIC began to improve around 2006-2007 through a combination of factors including a more rational pricing environment, pruning of bad businesses, expansion into higher value-add businesses, and overall better execution. For example, TECD's T12 ROIC was roughly 5% in 2007 but has steadily improved to above 10% during the past 2 years. We believe all the IT distributors within our coverage (with the exception of IM) is now generating returns slightly above their respective WACC but this is well understood by investors as a key highlight by the distribution companies.

#### **Offset by Risks...**

- **European exposure** – The two largest distributors (Tech Data and Ingram Micro) have relatively high revenue contributions from Europe, a region that poses the biggest demand risk given various macro challenges. Tech Data is by far the most exposed at almost 60% of revenues, while Ingram Micro's exposure is roughly 30%. Currency exchange rates (\$US/Euro) also compounds the risk as the devaluation of the Euro not only negatively impacts top-line (from currency translation), but also has an impact to overall demand as most products sold in Europe are Dollar-based (reducing purchasing power).
- **ERP roll-out snafu** – While overall execution has improved over the past 3-4 years, both Ingram Micro and Tech Data have both witnessed operational glitches as a result of transitioning to new ERP systems. Ingram Micro's difficulties in ERP roll-out has been much more pronounced, highlighted by the ERP snafu in Australia that dropped country revenues by 25% during 1CQ11. Six quarters later, the company is still struggling to regain share within that region. IM's management has postponed any major ERP roll-out for the meantime, but it remains an overhang once the roll-out resumes. Moreover, we expect IM's pending acquisition of Brightpoint could also pose a material integration risk (especially consolidation of ERP systems) in the future. Meanwhile, Tech Data witnessed similar ERP roll-out woes during the last quarter, however, the impact was significant less, and now appears under control.
- **Slim margins offer little room for error** – As in most distribution businesses, broadline IT distributors command paper-thin margins given the low-IP nature of their operations. Gross margins (or the mark-up fee) range between 5-6%, and operating margins are generally between 1-2%. While the high operational leverage offers significant earnings upside during periods of strong volume, any leg-down in demand significantly compresses the bottom line. According to our model, every 5% shortfall in IM's revenues would result in a ~25% compression in earnings. The non-recurring nature of the daily transactions compounds earnings risk during a soft demand environment.

- **Move to value-added services** – Broadline distributors have been gradually expanding into more value-added services during the past several years, albeit the revenue contribution remains fairly small as evidenced by Synnex (roughly 2% of total revs). This entrance into higher margin businesses allows distributors to take additional wallet share within their core SMB customers, and in the process helps their margin/return profiles. While the strategy has merit, we question how large these businesses can become given the risk that broadline distributors eventually begin to run into the incumbent value-added distributors such as Arrow and Avnet.

## Imaging

The printing/imaging market is a mature market (-1% shipment CAGR over the past four years), albeit with some niche pockets of opportunity such as industrial printing, ceramic tile & architectural uses. We continue to expect shipments and printed page volumes to remain pressured given:

**With our view of BYOD we believe the imaging sector will continue to face headwinds in the future.**

- Digitization which results in content being viewed on tablets, iPads and mobile devices (cloud/mobility enables more access to content) which is accelerated by BYOD and thus less need to print in the long run, and
- Shift to managed printing services and document outsourcing/business process outsourcing which tend to be more cost effective and result in less printing hardware.

Key trends in the imaging/printing hardware market:

- Single function printer market which comprised ~30% of the overall market will see continued pressure from competing multi function printers (Copiers + printers + scanners) in homes and offices that can offer better features and competitive pricing at comparable speeds. IDC expects the printer market to decline at a 0.8% CAGR during the 2011–2015 forecast periods. On the other hand, IDC expects the worldwide MFP market to grow at a CAGR of 6.3% in 2010–2015.
- Shift to color printing - Color represented 69% of total shipments in 2011. Although color penetration is much stronger in developed regions so far, the demand for entry-level devices from emerging regions will provide added impetus to color growth in the foreseeable future. Also in production/commercial print houses, color printers are expected to grow by 10.6% CAGR with revenues growing by 5% from 2011-2016 time period.
- Shift to laser printer – Of the combined market, inkjet machines represents 63% of total shipments. Laser represents 33%. Inkjets remain pressured at the expense of laser printers.

Imaging vendors are increasingly focused on imaging services (with estimated growth rates of ~10% CAGR through 2015 based on IDC estimates) to offset the slow growth in print hardware. Examples of these include:

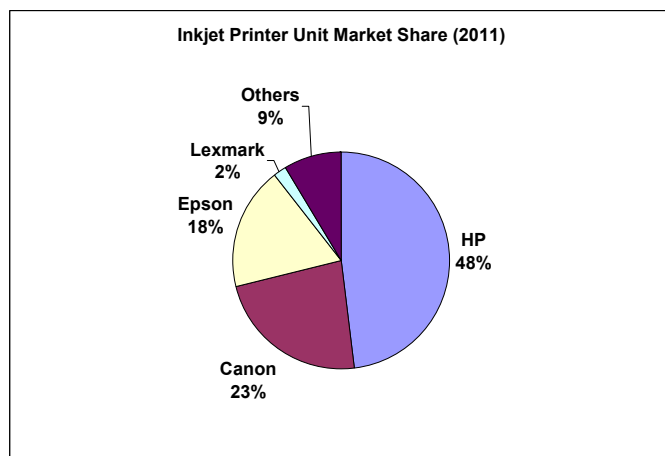
- An extension of managed print services to encompass centralized facilities such as the corporate copy center or CRD, mailroom, or datacenter printing facility and sourcing of commercial print;
- Integration of managed print services and managed IT services, offering the end customer one-stop shopping and the ability to work with a single trusted provider;
- Business process outsourcing (BPO, with many vendors already providing solutions to streamline vertical and line-of-business workflows, including professional and managed services;
- Management of content and big data to drive creation of higher-value and more effective documents for end users, which will drive customer communication management and marketing services

Figure 12. WW Printer Unit Shipment Historical and Forecast (2007 – 2015E), in 000s

Shipments (in 000s)										2007-2010	2010-2015E
	2007	2008	2009	2010	2011E	2012E	2013E	2014E	2015E	CAGR	CAGR
<b>Printers</b>											
Impact	4,001	3,857	3,528	4,150	4,810	4,402	4,002	3,647	3,293	6.3%	-4.5%
Inkjet	29,686	23,395	18,067	17,113	15,136	13,949	12,826	11,899	11,144	-20.1%	-8.2%
Monochrome Laser	21,435	19,975	15,991	19,614	20,748	21,810	22,512	22,947	23,365	-1.1%	3.6%
Color Laser	3,989	4,018	3,211	3,545	3,658	3,959	4,273	4,618	4,974	-2.8%	7.0%
<b>Total Printers</b>	<b>59,112</b>	<b>51,245</b>	<b>40,797</b>	<b>44,422</b>	<b>44,351</b>	<b>44,119</b>	<b>43,613</b>	<b>43,111</b>	<b>42,777</b>	<b>-9.1%</b>	<b>-0.8%</b>
<b>MFPs</b>											
Inkjet	62,050	62,161	58,904	65,370	69,160	73,529	77,799	81,720	84,907	3.7%	5.4%
Monochrome Laser	10,056	10,669	9,187	11,963	13,905	15,292	16,511	17,638	18,590	11.4%	9.2%
Color Laser	1,887	2,407	2,468	3,098	3,482	4,048	4,616	5,156	5,654	22.7%	12.8%
<b>Total MFPs</b>	<b>73,993</b>	<b>75,237</b>	<b>70,559</b>	<b>80,430</b>	<b>86,547</b>	<b>92,869</b>	<b>98,925</b>	<b>104,513</b>	<b>109,151</b>	<b>5.4%</b>	<b>6.3%</b>
<b>Total Units</b>	<b>133,105</b>	<b>126,482</b>	<b>111,356</b>	<b>124,852</b>	<b>130,898</b>	<b>136,988</b>	<b>142,538</b>	<b>147,624</b>	<b>151,928</b>	<b>-0.6%</b>	<b>4.0%</b>

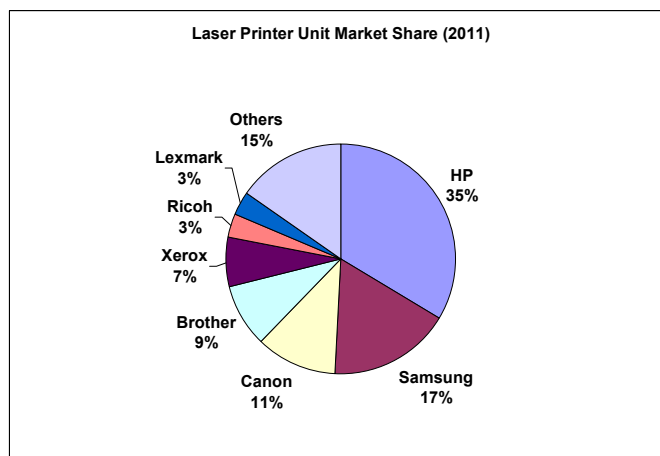
Source: IDC

Figure 13. Inkjet Printer Unit Market Share



Source: IDC

Figure 14. Laser Printer Unit Market Share



Source: IDC

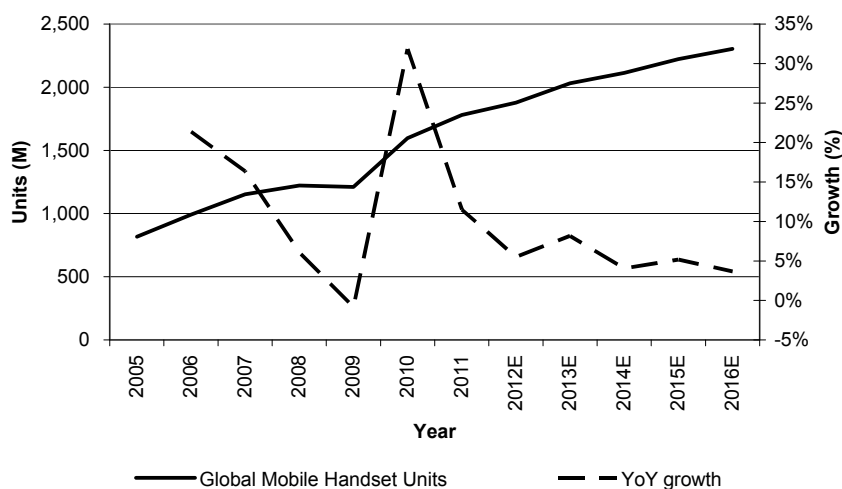


## Handsets

During the past decade we have seen several changes in the handset industry that caused the significant disruptions to the industry leaders. In the early 2000s, innovation was primarily handset hardware based (Motorola Startac flip phone followed by the Nokia slim candy bar followed by the Motorola RAZR thin flip phone followed by the Blackberry QWERTY keyboard). However, with the launch of Apple's iPhone and Google's Android operating system the focus has shifted to focus on the operating system and smart phone functionality. In fact the hardware and form factors have now closely resembled each other while the market shares and profitability have never been more divergent.

Global handset market growth has materially slowed to single digits compared to double-digit growth in prior years.

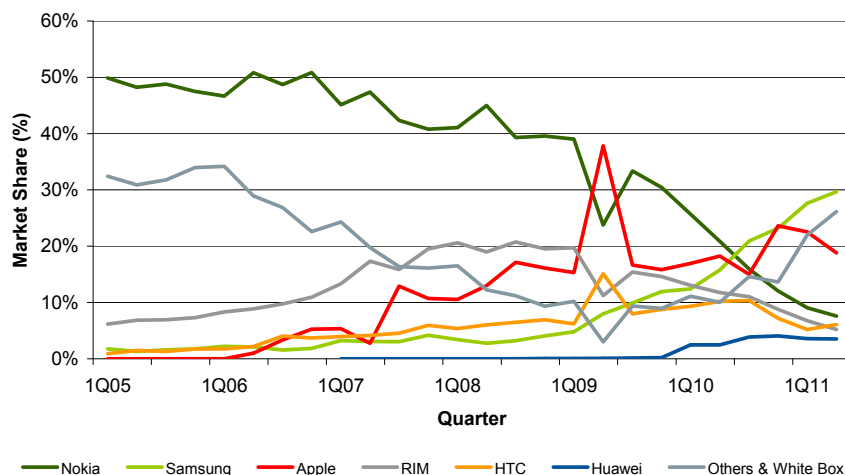
Figure 15. Global Handset Units



Source: Citi Research and Gartner

Samsung and Apple have gained share while Nokia and RIM have lost significant market share

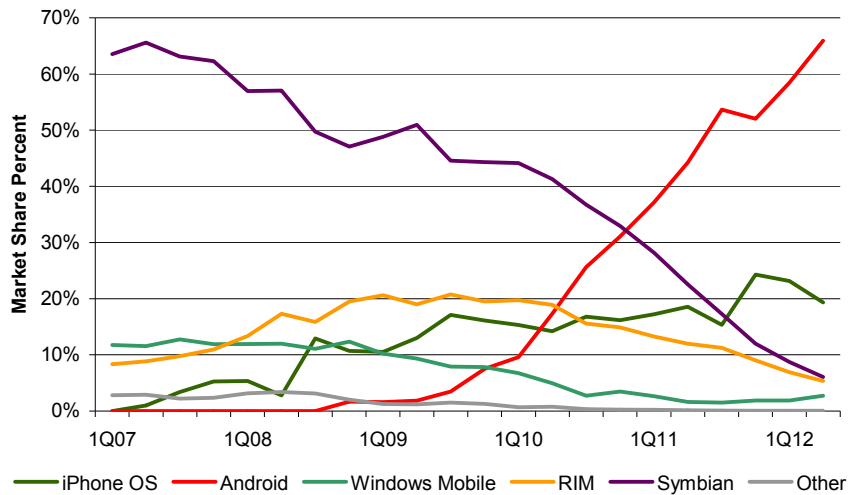
Figure 16. Smart Phone Market Share



Source: Citi Research and Gartner

Android (Google based) operating market share has experienced the most growth due to its open source and free fee structure therefore embraced by several OEMs (Samsung, HTC, LG, Motorola, Sony Ericsson, etc). iPhone has also experienced growth but the operating system is not licensed outside of Apple. Nokia Symbian market share has plummeted as Nokia embraces Microsoft and divests Symbian.

Figure 17. Handset Operating System Market Share



Source: Citi Research and Gartner

## Company Focus

- Company Update
- Initiation of Coverage

<b>Buy</b>	<b>1</b>
Price (05 Oct 12)	US\$210.59
Target price	US\$250.00
Expected share price return	18.7%
Expected dividend yield	1.4%
<b>Expected total return</b>	<b>20.2%</b>
Market Cap	US\$240,657M

### Price Performance (RIC: IBM.N, BB: IBM US)



## International Business Machines Corp (IBM)

### Most Compelling Investment in our Tech Hardware Universe

- **Stock Call** – With co-coverage (Jim Suva IT Hardware and Ashwin Shirvaikar IT Services) we are initiating on IBM with a Buy rating & 12-month target of \$250. We believe IBM is one of the most compelling long-term investments within Technology Hardware. IBM is uniquely positioned within the major IT vendors given its arguably best-in-class portfolio of products, services and to embrace both an eventual improving economy & BYOD. On hardware, IBM essentially has a monopoly within mainframes which remains superior to x-86 servers in terms of reliability, utilization, security & throughput which will see an upgrade in 2013. IBM's software portfolio, highlighted by its middleware, allows the company to provide superior integration & manageability of the customer's datacenter. IBM's services platform (consulting, BPO, IT outsourcing) allows IBM to offer a turnkey solution to customers and also a channel to sell its products. The combination of these assets makes IBM arguably the most compelling end-to-end solutions provider in areas such as infrastructure roll-out, system integration, IT outsourcing & BYOD. From a financial perspective, IBM is the only company within our universe that sets a 5-year EPS target, strong earnings visibility (60-70% of revenues are recurring), as well as the ability to generate earnings growth via a combination of several levers including organic growth, acquisitions, share repurchases & margin expansion.
- **Potential catalysts** – Our estimates may prove to be conservative if the following occurs: 1) better-than-anticipated execution on revenue mix shift including the relatively under-appreciated shift in the services business, 2) a potential refresh of the z-Series & IBM shares have generally performed well during the initial stages of the mainframe cycle given the earnings pick up (Roughly 30-35% of IBM's revenues are related to the mainframe business), 3) faster-than-expected share repurchases.
- **What could make us more negative?** – 1) any meaningful slowdown in infrastructure roll-out in emerging markets given that it has been a key driver of IBM's revenue growth (and mainframe adoption), 2) material drop in long-term Services signings as it has an eventual impact to Services revenues, 3) muted adoption of the pending new zSeries mainframes, 4) potential share loss (or slower growth) in the key branded Middleware segment, which could limit the expectation of positive mix shift, and 5) valuation gets excessive.
- **Valuation** – Our target price of \$250 is based on 13x F12-month EPS, in line with the 3-year average PE multiple. We are materially above the street (6% above on FY13 EPS estimate) given a more constructive view on Services & Software, as well as baking in hardware uplift from the impending z-Series refresh. Our Buy rating compares with Street ratings of 55% hold, 45% buy.

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
2011A	2.41A	3.09A	3.28A	4.71A	13.49A	13.44A
2012E	2.78A	3.51A	3.61E	5.28E	15.18E	15.14E
Previous	na	na	na	na	na	na
2013E	3.19E	4.20E	4.31E	6.21E	17.91E	16.67E
Previous	na	na	na	na	na	na
2014E	3.75E	4.64E	4.65E	6.62E	19.67E	18.25E
Previous	na	na	na	na	na	na

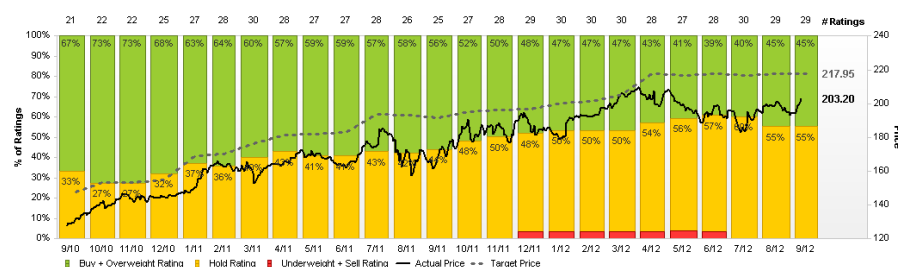
Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

## Recent Results and Outlook

For 3Q12, IBM reported revenues of \$25.78B (-3% yoy, +4% qoq), below the consensus estimate of \$26.3B. The revenue shortfall was driven by currency (hedged so no EPS impact) as well as soft hardware demand due to the macro spending environment. Global Services signings of \$13.7B had a significant sequential uplift (+16% qoq). Meanwhile, the mainframe hardware revenues were down 25% yoy signaling the tail-end of the current upgrade cycle. Gross margin of 48.2% was 90bps above consensus, driven by an increase in Services margins as well as product mix (disproportional growth in high-margin Software segment). Reported EPS of \$3.51 was better than consensus of \$3.43 due to margin improvements and stock repurchases.

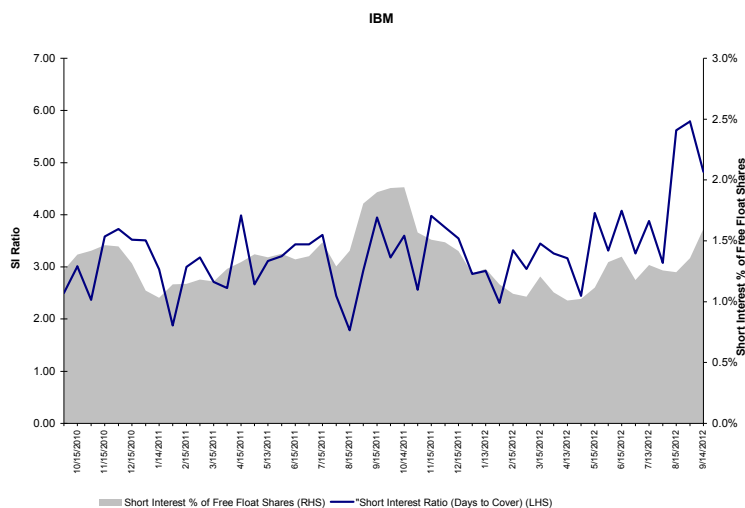
The company raised the full-year 2012 EPS from at least \$15.00 to at least \$15.10. This is driven by the company's confidence in continued margin expansion (positive mix shift and productivity improvements) as well as healthy pace of share repurchase. Revenue growth will be limited in 2H given currency headwinds, but should return to low single digit growth in CY13 given easy comps and the widely expected refresh of the z-series. IBM does not provide quarterly sales and EPS guidance.

Figure 1. IBM Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Figure 2. IBM Short Interest Analysis



Source: FactSet and Citi Research

Figure 3. IBM Income Statement (detailed model available upon request)

Income Statement (IBM)												
Fiscal Year Ends December												
Dollars in Millions												
	FY10	FY11	1Q	2Q	3QE	4QE	FY12E	1QE	2QE	3QE	4QE	FY13E
			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13	
<b>Total Services Revenue</b>	<b>\$58,535</b>	<b>\$62,202</b>	<b>\$15,148</b>	<b>\$15,133</b>	<b>\$15,554</b>	<b>\$15,943</b>	<b>\$61,778</b>	<b>\$15,550</b>	<b>\$15,673</b>	<b>\$16,118</b>	<b>\$16,740</b>	<b>\$64,079</b>
% chg yr to yr	3%	7%	1%	-3%	-1%	0%	-1%	2%	3%	4%	5%	3%
% chg qtr to qtr	-	-	-4%	0%	2%	3%	-	-2%	1%	3%	4%	-
<b>Total Hardware Revenue</b>	<b>\$18,775</b>	<b>\$19,823</b>	<b>\$3,900</b>	<b>\$4,418</b>	<b>\$4,352</b>	<b>\$5,850</b>	<b>\$18,520</b>	<b>\$4,042</b>	<b>\$4,682</b>	<b>\$4,853</b>	<b>\$6,526</b>	<b>\$20,104</b>
% chg yr to yr	11%	6%	-7%	-9%	-8%	-4%	-7%	3%	5%	12%	12%	8%
% chg qtr to qtr	-	-	-35%	14%	-3%	34%	-	-31%	16%	4%	34%	-
<b>Total Software Revenue</b>	<b>\$18,775</b>	<b>\$19,823</b>	<b>\$3,900</b>	<b>\$4,418</b>	<b>\$4,352</b>	<b>\$5,850</b>	<b>\$18,520</b>	<b>\$4,042</b>	<b>\$4,682</b>	<b>\$4,853</b>	<b>\$6,526</b>	<b>\$20,104</b>
% chg yr to yr	11%	6%	-7%	-9%	-8%	-4%	-7%	3%	5%	12%	12%	8%
% chg qtr to qtr	-	-	-35%	14%	-3%	34%	-	-31%	16%	4%	34%	-
<b>Total Global Financing Revenue</b>	<b>\$25,434</b>	<b>\$28,219</b>	<b>\$6,440</b>	<b>\$6,947</b>	<b>\$6,839</b>	<b>\$9,079</b>	<b>\$29,304</b>	<b>\$6,736</b>	<b>\$7,852</b>	<b>\$7,581</b>	<b>\$9,860</b>	<b>\$32,030</b>
% chg yr to yr	5%	11%	6%	0%	3%	4%	3%	6%	12%	11%	9%	9%
% chg qtr to qtr	-	-	-27%	10%	-3%	33%	-	-26%	17%	-3%	30%	-
<b>Total Global Financing Revenue</b>	<b>\$4,079</b>	<b>\$4,196</b>	<b>\$975</b>	<b>\$1,032</b>	<b>\$884</b>	<b>\$972</b>	<b>\$3,864</b>	<b>\$856</b>	<b>\$907</b>	<b>\$862</b>	<b>\$948</b>	<b>\$3,573</b>
% chg yr to yr	-3%	-6%	-5%	0%	-6%	-1%	-3%	-3%	-3%	-3%	-3%	-3%
% chg qtr to qtr	-	-	-11%	6%	-5%	10%	-	-12%	6%	-5%	10%	-
<b>Revenue</b>	<b>\$99,870</b>	<b>\$106,917</b>	<b>\$24,673</b>	<b>\$25,783</b>	<b>\$25,788</b>	<b>\$29,603</b>	<b>\$105,847</b>	<b>\$25,383</b>	<b>\$27,117</b>	<b>\$27,445</b>	<b>\$31,685</b>	<b>\$111,631</b>
% chg qtr to qtr	0%	0%	-16%	4%	0%	15%	0%	-14%	7%	1%	15%	0%
Cost of Goods Sold	\$53,801	\$56,437	\$13,395	\$13,343	\$13,444	\$14,460	\$54,642	\$13,595	\$13,729	\$13,928	\$15,149	\$56,400
<b>Gross Profit</b>	<b>\$46,069</b>	<b>\$50,480</b>	<b>\$11,278</b>	<b>\$12,440</b>	<b>\$12,344</b>	<b>\$15,144</b>	<b>\$51,206</b>	<b>\$11,788</b>	<b>\$13,388</b>	<b>\$13,517</b>	<b>\$16,536</b>	<b>\$55,231</b>
SG&A	\$21,628	\$23,273	\$5,766	\$5,717	\$5,454	\$5,691	\$22,628	\$5,522	\$5,642	\$5,732	\$5,913	\$22,808
R&D	\$6,152	\$6,345	\$1,605	\$1,592	\$1,516	\$1,580	\$6,293	\$1,617	\$1,613	\$1,540	\$1,608	\$6,377
Operating Expenses	\$27,780	\$29,618	\$7,371	\$7,309	\$6,970	\$7,272	\$28,921	\$7,139	\$7,254	\$7,272	\$7,520	\$29,185
<b>Operating Income</b>	<b>\$18,289</b>	<b>\$20,862</b>	<b>\$3,907</b>	<b>\$5,131</b>	<b>\$5,374</b>	<b>\$7,872</b>	<b>\$22,284</b>	<b>\$4,650</b>	<b>\$6,134</b>	<b>\$6,246</b>	<b>\$9,016</b>	<b>\$26,046</b>
Depr and amort	\$4,831	\$4,815	\$1,157	\$1,129	\$1,129	\$1,129	\$4,543	\$1,179	\$1,179	\$1,179	\$1,179	\$4,715
EBITDA	\$23,120	\$25,677	\$5,064	\$6,260	\$6,503	\$9,001	\$26,828	\$5,829	\$7,313	\$7,424	\$10,195	\$30,761
Other (income), expense	(\$793)	(\$46)	(\$59)	(\$133)	\$0	\$0	(\$192)	\$0	\$0	\$0	\$0	\$0
Intellectual property and custom dev (income)	(\$1,154)	(\$1,108)	(\$255)	(\$289)	(\$289)	(\$289)	(\$1,122)	(\$289)	(\$289)	(\$289)	(\$289)	(\$1,156)
Interest Expense	\$369	\$410	\$110	\$117	\$117	\$117	\$461	\$117	\$117	\$117	\$117	\$468
Pretax Income	\$19,867	\$21,606	\$4,111	\$5,436	\$5,546	\$8,044	\$23,137	\$4,822	\$6,306	\$6,418	\$9,188	\$26,734
Provision for Taxes	\$4,845	\$5,288	\$846	\$1,359	\$1,387	\$2,011	\$5,603	\$1,205	\$1,577	\$1,604	\$2,297	\$6,683
Effective Tax Rate	24.4%	24.5%	20.6%	25.0%	25.0%	25.0%	24.2%	25.0%	25.0%	25.0%	25.0%	25.0%
<b>Net Income</b>	<b>\$15,022</b>	<b>\$16,318</b>	<b>\$3,265</b>	<b>\$4,077</b>	<b>\$4,160</b>	<b>\$6,033</b>	<b>\$17,535</b>	<b>\$3,616</b>	<b>\$4,730</b>	<b>\$4,813</b>	<b>\$6,891</b>	<b>\$20,050</b>
Non-GAAP Net Income to Common	\$15,022	\$16,318	\$3,265	\$4,077	\$4,160	\$6,033	\$17,535	\$3,616	\$4,730	\$4,813	\$6,891	\$20,050
<b>GAAP Net Income</b>	<b>\$14,834</b>	<b>\$15,854</b>	<b>\$3,066</b>	<b>\$3,881</b>	<b>\$4,160</b>	<b>\$6,033</b>	<b>\$17,140</b>	<b>\$3,616</b>	<b>\$4,730</b>	<b>\$4,813</b>	<b>\$6,891</b>	<b>\$20,050</b>
Basic EPS	\$11.84	\$13.63	\$2.82	\$3.55	\$3.65	\$5.34	\$15.32	\$3.23	\$4.25	\$4.36	\$6.29	\$18.09
<b>Diluted EPS</b>	<b>\$11.72</b>	<b>\$13.49</b>	<b>\$2.78</b>	<b>\$3.51</b>	<b>\$3.61</b>	<b>\$5.28</b>	<b>\$15.18</b>	<b>\$3.19</b>	<b>\$4.20</b>	<b>\$4.31</b>	<b>\$6.21</b>	<b>\$17.91</b>
Basic Shares Out (million)	1,269	1,197	1,159	1,149	1,139	1,130	1,144	1,121	1,112	1,104	1,096	1,108
Diluted Shares Out (million)	1,281	1,209	1,174	1,162	1,152	1,143	1,155	1,134	1,125	1,117	1,109	1,119
<b>Percent of Revenue</b>												
Gross Margin (incl. Options Expense)	46.1%	47.2%	45.7%	48.2%	47.9%	51.2%	48.4%	46.4%	49.4%	49.3%	52.2%	49.5%
SG&A + Options Expense	21.7%	21.8%	23.4%	22.2%	21.1%	19.2%	21.4%	21.8%	20.8%	20.9%	18.7%	20.4%
R&D + Options Expense	6.2%	5.9%	6.5%	6.2%	5.9%	5.3%	5.9%	6.4%	5.9%	5.6%	5.1%	5.7%
Total Op Ex	27.8%	27.7%	29.9%	28.3%	27.0%	24.6%	27.3%	28.1%	26.8%	26.5%	23.7%	26.1%
Operating Income	18.3%	19.5%	15.8%	19.9%	20.8%	26.6%	21.1%	18.3%	22.6%	22.8%	28.5%	23.3%
Pre-tax Income	19.9%	20.2%	16.7%	21.1%	21.5%	27.2%	21.9%	19.0%	23.3%	23.4%	29.0%	23.9%
Net Income	15.0%	15.3%	13.2%	15.8%	16.1%	20.4%	16.6%	14.2%	17.4%	17.5%	21.7%	18.0%
<b>% Change Year to Year</b>												
Revenue	4.3%	7.1%	0.3%	-3.3%	-1.4%	0.4%	-1.0%	2.9%	5.2%	6.4%	7.0%	5.5%
Cost of Sales + Options Expense	3.4%	4.9%	-1.9%	-6.0%	-3.3%	-1.6%	-3.2%	1.5%	2.9%	3.6%	4.8%	3.2%
Gross Profit	5.4%	9.6%	2.9%	-0.3%	0.7%	2.4%	1.4%	4.5%	7.6%	9.5%	9.2%	7.9%
SG&A + Options Expense	4.1%	7.6%	0.5%	-3.9%	-2.4%	-5.1%	-2.8%	-4.2%	-1.3%	5.1%	3.9%	0.8%
R&D + Options Expense	3.5%	3.1%	-0.1%	-0.1%	-3.3%	0.1%	-0.8%	0.7%	1.3%	1.6%	1.8%	1.3%
Total Op Ex	3.9%	6.6%	0.3%	-3.1%	-2.6%	-4.0%	-2.4%	-3.2%	-0.8%	4.3%	3.4%	0.9%
Operating Income	7.6%	14.1%	8.2%	4.0%	5.4%	9.0%	6.8%	19.0%	19.6%	16.2%	14.5%	16.9%
Pretax Income	9.6%	8.8%	3.1%	7.9%	7.1%	8.6%	7.1%	17.3%	16.0%	15.7%	14.2%	15.5%
Net Income	11.7%	8.6%	9.2%	7.9%	5.2%	7.8%	7.5%	10.8%	16.0%	15.7%	14.2%	14.3%
Fully Diluted EPS before Extra	16.9%	15.1%	15.3%	13.5%	10.0%	12.1%	12.5%	14.7%	19.8%	19.4%	17.7%	18.0%

Source: Company report, Citi Research

Figure 4. IBM Balance Sheet & Cash Flow Statement (detailed model available upon request)

**Balance Sheet (IBM)**

Fiscal Year Ends December	FY10	FY11	1Q	2Q	3QE	4QE	FY12E	1QE	2QE	3QE	4QE	FY13E	FY14E
Dollars in Millions			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
Cash and Cash Equivalents	\$10,661	\$11,922	\$11,835	\$10,864	\$9,775	\$12,255	\$12,255	\$10,875	\$10,839	\$10,768	\$14,421	\$14,421	\$16,393
Marketable Securities	\$990	\$0	\$500	\$323	\$323	\$323	\$323	\$323	\$323	\$323	\$323	\$323	\$323
Trade Receivables	\$10,834	\$11,179	\$10,012	\$10,172	\$9,582	\$11,223	\$11,223	\$10,300	\$10,698	\$10,198	\$12,013	\$12,013	\$12,256
Short-term Financing Receivables	\$16,257	\$16,901	\$15,160	\$14,982	\$14,569	\$17,408	\$17,408	\$15,615	\$15,431	\$15,006	\$17,930	\$17,930	\$18,468
Other Receivables	\$1,134	\$1,481	\$1,669	\$1,703	\$1,703	\$1,703	\$1,703	\$1,703	\$1,703	\$1,703	\$1,703	\$1,703	\$1,703
Total Inventories	\$2,450	\$2,596	\$2,754	\$2,758	\$2,625	\$2,606	\$2,606	\$2,833	\$2,901	\$2,794	\$2,790	\$2,790	\$2,846
Deferred Income Taxes	\$1,564	\$1,601	\$1,617	\$1,478	\$1,315	\$1,746	\$1,746	\$1,924	\$1,767	\$1,528	\$2,000	\$2,000	\$2,077
Prepaid Expenses and Other Current Assets	\$4,226	\$5,249	\$5,299	\$5,113	\$5,452	\$5,724	\$5,724	\$6,307	\$6,113	\$6,336	\$6,556	\$6,556	\$6,809
<b>Total Current Assets</b>	<b>\$48,116</b>	<b>\$50,929</b>	<b>\$48,846</b>	<b>\$47,393</b>	<b>\$45,345</b>	<b>\$52,989</b>	<b>\$52,989</b>	<b>\$49,880</b>	<b>\$49,775</b>	<b>\$48,656</b>	<b>\$57,734</b>	<b>\$57,734</b>	<b>\$60,875</b>
Property, Plant and Equipment, gross	\$40,289	\$40,124	\$40,441	\$41,341	\$42,241	\$43,141	\$43,141	\$44,141	\$45,141	\$46,141	\$47,141	\$47,141	\$51,541
Accumulated Depreciation	(\$26,193)	(\$26,241)	(\$26,496)	(\$27,496)	(\$28,496)	(\$29,496)	(\$29,496)	(\$30,546)	(\$31,596)	(\$32,646)	(\$33,696)	(\$33,696)	(\$37,896)
Property, Plant and Equipment, net	\$14,096	\$13,883	\$13,946	\$13,845	\$13,745	\$13,645	\$13,645	\$13,595	\$13,545	\$13,495	\$13,445	\$13,445	\$13,645
Long-term Financing Receivables	\$10,548	\$10,776	\$10,549	\$10,795	\$10,125	\$11,099	\$11,099	\$10,865	\$11,119	\$10,429	\$11,432	\$11,432	\$11,775
Intangible Assets & Other	\$12,486	\$11,790	\$11,563	\$11,182	\$11,053	\$10,925	\$10,925	\$10,796	\$10,667	\$10,538	\$10,410	\$10,410	\$9,895
Goodwill	\$25,136	\$26,213	\$27,468	\$27,735	\$28,485	\$29,235	\$29,235	\$29,985	\$30,735	\$31,485	\$32,235	\$32,235	\$35,235
Prepaid Pension Assets	\$3,068	\$2,843	\$2,974	\$2,862	\$2,862	\$2,862	\$2,862	\$2,862	\$2,862	\$2,862	\$2,862	\$2,862	\$2,862
Total Intangible and Other Assets	\$40,690	\$40,846	\$42,005	\$41,779	\$42,400	\$43,022	\$43,022	\$43,643	\$44,264	\$44,885	\$45,507	\$45,507	\$47,992
<b>Total Assets</b>	<b>\$113,450</b>	<b>\$116,434</b>	<b>\$115,346</b>	<b>\$113,832</b>	<b>\$111,615</b>	<b>\$120,755</b>	<b>\$120,755</b>	<b>\$117,983</b>	<b>\$118,703</b>	<b>\$117,465</b>	<b>\$128,118</b>	<b>\$128,118</b>	<b>\$134,287</b>
Income Taxes Payable	\$4,216	\$3,313	\$2,184	\$2,183	\$2,528	\$3,599	\$3,599	\$2,562	\$2,532	\$2,925	\$4,111	\$4,111	\$4,267
Accounts Payable	\$7,804	\$8,517	\$7,416	\$7,482	\$6,858	\$8,382	\$8,382	\$7,526	\$7,698	\$7,105	\$8,781	\$8,781	\$8,889
Compensation and benefits	\$5,028	\$5,099	\$4,370	\$4,656	\$4,971	\$5,252	\$5,252	\$4,501	\$4,796	\$5,120	\$5,410	\$5,410	\$5,572
Short-term Debt	\$6,778	\$8,463	\$6,293	\$7,669	\$7,669	\$7,669	\$7,669	\$7,669	\$7,669	\$7,669	\$7,669	\$7,669	\$7,669
Deferred Revenue	\$11,580	\$12,197	\$13,269	\$12,311	\$12,311	\$12,311	\$12,311	\$12,311	\$12,311	\$12,311	\$12,311	\$12,311	\$12,311
Other current	\$5,156	\$4,535	\$4,677	\$4,602	\$4,559	\$4,671	\$4,671	\$4,817	\$4,740	\$4,696	\$4,811	\$4,811	\$4,956
<b>Total Current Liabilities</b>	<b>\$40,562</b>	<b>\$42,124</b>	<b>\$38,209</b>	<b>\$38,903</b>	<b>\$38,896</b>	<b>\$41,884</b>	<b>\$41,884</b>	<b>\$39,387</b>	<b>\$39,746</b>	<b>\$39,826</b>	<b>\$43,093</b>	<b>\$43,093</b>	<b>\$43,664</b>
Long Term Debt	\$21,846	\$22,857	\$25,760	\$24,766	\$24,766	\$24,766	\$24,766	\$24,766	\$24,766	\$24,766	\$24,766	\$24,766	\$24,766
Other Liabilities	\$27,871	\$31,217	\$30,595	\$29,599	\$27,273	\$31,341	\$31,341	\$31,475	\$31,130	\$29,026	\$33,545	\$33,545	\$34,225
<b>Total Liabilities</b>	<b>\$90,279</b>	<b>\$96,198</b>	<b>\$94,564</b>	<b>\$93,268</b>	<b>\$90,934</b>	<b>\$97,991</b>	<b>\$97,991</b>	<b>\$95,628</b>	<b>\$95,643</b>	<b>\$93,617</b>	<b>\$101,404</b>	<b>\$101,404</b>	<b>\$102,655</b>
Common Stock	\$45,418	\$48,129	\$48,800	\$49,157	\$49,157	\$49,157	\$49,157	\$49,157	\$49,157	\$49,157	\$49,157	\$49,157	\$49,157
Retained Earnings	\$92,532	\$104,857	\$107,036	\$109,928	\$113,138	\$118,221	\$118,221	\$120,812	\$124,517	\$128,305	\$134,171	\$134,171	\$151,089
Treasury Stock	(\$96,161)	(\$110,963)	(\$114,020)	(\$117,116)	(\$120,116)	(\$123,116)	(\$123,116)	(\$126,116)	(\$129,116)	(\$132,116)	(\$135,116)	(\$135,116)	(\$147,116)
Accumulated Gain (Loss) not affecting R.E.	(\$18,743)	(\$21,885)	(\$21,115)	(\$21,498)	(\$21,498)	(\$21,498)	(\$21,498)	(\$21,498)	(\$21,498)	(\$21,498)	(\$21,498)	(\$21,498)	(\$21,498)
Noncontrolling Interest and Others	\$125	\$98	\$81	\$93	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<b>Shareholders' Equity</b>	<b>\$23,171</b>	<b>\$20,236</b>	<b>\$20,782</b>	<b>\$20,564</b>	<b>\$20,681</b>	<b>\$22,764</b>	<b>\$22,764</b>	<b>\$22,355</b>	<b>\$23,060</b>	<b>\$23,848</b>	<b>\$26,714</b>	<b>\$26,714</b>	<b>\$31,632</b>
<b>Total Liabilities and Equity</b>	<b>\$113,450</b>	<b>\$116,434</b>	<b>\$115,346</b>	<b>\$113,832</b>	<b>\$111,615</b>	<b>\$120,755</b>	<b>\$120,755</b>	<b>\$117,983</b>	<b>\$118,703</b>	<b>\$117,465</b>	<b>\$128,118</b>	<b>\$128,118</b>	<b>\$134,287</b>

**Cash Flow Statement (IBM)**

Fiscal Year Ends December	FY10	FY11	1Q	2Q	3QE	4QE	FY12E	1QE	2QE	3QE	4QE	FY13E	FY14E
Dollars in Millions			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
Net Income	\$14,833	\$15,855	\$3,066	\$3,881	\$4,160	\$6,033	\$17,140	\$3,616	\$4,730	\$4,813	\$6,891	\$20,050	\$21,418
Depreciation	\$3,657	\$3,589	\$847	\$1,000	\$1,000	\$1,000	\$3,847	\$1,050	\$1,050	\$1,050	\$1,050	\$4,200	\$4,200
Amortization of Intangibles	\$1,174	\$1,226	\$310	\$129	\$129	\$129	\$696	\$129	\$129	\$129	\$129	\$515	\$515
Stock-based compensation	\$629	\$697	\$168	\$168	\$168	\$168	\$672	\$168	\$168	\$168	\$168	\$672	\$672
Gain on Sale of Assets	(\$801)	(\$342)	(\$143)	\$0	\$0	\$0	(\$143)	\$0	\$0	\$0	\$0	\$0	\$0
<b>Balance Sheet Items:</b>													
Accounts receivable	(\$489)	(\$1,279)	\$0	(\$160)	\$590	(\$1,642)	(\$1,211)	\$923	(\$398)	\$501	(\$1,815)	(\$789)	(\$243)
Inventories	\$92	(\$163)	\$0	(\$4)	\$133	\$19	\$148	(\$227)	(\$67)	\$107	\$5	(\$183)	(\$57)
Deferred Income Taxes	\$1,294	\$1,212	\$0	\$139	\$163	(\$431)	(\$129)	(\$179)	\$157	\$239	(\$472)	(\$254)	(\$77)
Pension Assets	(\$1,963)	(\$1,371)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Other Assets	\$949	(\$28)	\$0	\$330	\$73	(\$3,110)	(\$2,707)	\$1,210	\$377	\$202	(\$3,143)	(\$1,354)	(\$792)
Accounts payable	\$174	\$451	\$0	\$66	(\$624)	\$1,523	\$966	(\$855)	\$172	(\$593)	\$1,676	\$400	\$108
Other liabilities	\$0	\$0	\$0	(\$1,744)	(\$1,710)	\$5,533	\$2,079	(\$1,508)	(\$157)	(\$1,433)	\$6,111	\$3,014	\$1,143
<b>Cash Flows from Operations</b>	<b>\$19,549</b>	<b>\$19,847</b>	<b>\$4,291</b>	<b>\$3,805</b>	<b>\$4,082</b>	<b>\$9,222</b>	<b>\$21,400</b>	<b>\$4,329</b>	<b>\$6,160</b>	<b>\$5,182</b>	<b>\$10,599</b>	<b>\$26,270</b>	<b>\$26,887</b>
Net Investment in PP&E	(\$3,415)	(\$3,500)	(\$842)	(\$900)	(\$900)	(\$900)	(\$3,542)	(\$1,000)	(\$1,000)	(\$1,000)	(\$1,000)	(\$4,000)	(\$4,400)
Investments in Software	(\$569)	(\$559)	(\$160)	\$0	\$0	\$0	(\$160)	\$0	\$0	\$0	\$0	\$0	\$0
Purchase of ST Investments	(\$6,129)	(\$1,594)	(\$1,227)	\$177	\$0	\$0	(\$1,050)	\$0	\$0	\$0	\$0	\$0	\$0
Proceeds from ST Investments	\$7,877	\$3,345	\$681	\$700	\$0	\$0	\$1,381	\$0	\$0	\$0	\$0	\$0	\$0
Acquisitions	(\$5,922)	(\$1,811)	(\$1,319)	(\$1,767)	(\$750)	(\$750)	(\$4,586)	(\$750)	(\$750)	(\$750)	(\$750)	(\$3,000)	(\$3,000)
Divestitures	\$55	\$14	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Other Investing Liabilities	(\$404)	(\$291)	\$636	(\$134)	\$670	(\$974)	\$198	\$234	(\$253)	\$690	(\$1,004)	(\$333)	(\$343)
<b>Cash Flows from Investing</b>	<b>(\$8,507)</b>	<b>(\$4,396)</b>	<b>(\$2,231)</b>	<b>(\$1,924)</b>	<b>(\$980)</b>	<b>(\$2,624)</b>	<b>(\$7,759)</b>	<b>(\$1,516)</b>	<b>(\$2,003)</b>	<b>(\$1,060)</b>	<b>(\$2,754)</b>	<b>(\$7,333)</b>	<b>(\$7,743)</b>
Proceeds from New Debt	\$8,055	\$9,996	\$3,906	\$382	\$0	\$0	\$4,288	\$0	\$0	\$0	\$0	\$0	\$0
Short-term repayments/borrowings	\$817	\$1,321	(\$2,107)	\$0	\$0	\$0	(\$2,107)	\$0	\$0	\$0	\$0	\$0	\$0
Payments to Settle Debt	(\$6,522)	(\$8,947)	(\$848)	\$0	\$0	\$0	(\$848)	\$0	\$0	\$0	\$0	\$0	\$0
Common Stock Repurchases - net	(\$15,375)	(\$15,046)	(\$3,015)	(\$3,000)	(\$3,000)	(\$3,000)	(\$12,015)	(\$3,000)	(\$3,000)	(\$3,000)	(\$3,000)	(\$12,000)	(\$12,000)
Common Stock Transactions, other	\$3,774	\$2,453	\$619	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Cash Dividends Paid	(\$3,178)	(\$3,473)	(\$870)	(\$950)	(\$950)	(\$950)	(\$3,720)	(\$1,025)	(\$1,025)	(\$1,025)	(\$1,025)	(\$4,100)	(\$4,500)
Cash Flows from Financing	\$12,429	\$13,696	(\$2,315)	(\$3,568)	(\$3,950)	(\$3,950)	(\$14,402)	(\$4,025)	(\$4,025)	(\$4,025)	(\$4,025)	(\$16,100)	(\$16,500)
Effect of FX Rate Changes on Cash	(\$135)	(\$493)	\$167	\$0	\$0	\$0	\$167	\$0	\$0	\$0	\$0	\$0	\$0
<b>Net Change in Cash</b>	<b>(\$1,522)</b>	<b>\$1,262</b>	<b>(\$88)</b>	<b>(\$1,687)</b>	<b>(\$848)</b>	<b>\$2,648</b>	<b>(\$594)</b>	<b>(\$1,213)</b>	<b>\$132</b>	<b>\$97</b>	<b>\$3,821</b>	<b>\$2,837</b>	<b>\$2,644</b>

Source: Company report, Citi Research

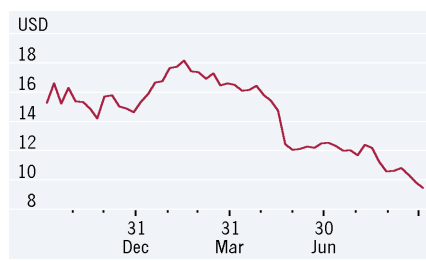


## Company Focus

- Company Update
- Initiation of Coverage

<b>Sell</b>	<b>3</b>
Price (05 Oct 12)	US\$9.66
Target price	US\$8.50
Expected share price return	-12.0%
Expected dividend yield	3.3%
<b>Expected total return</b>	<b>-8.7%</b>
Market Cap	US\$16,756M

### Price Performance (RIC: DELL.O, BB: DELL US)



## Dell Inc (DELL)

### A Non Consensus Sell Rating as 2013 & 2014 Consensus Estimates Too High; BYOD to the Enterprise To Pressure EPS

- **Stock Call** — We are initiating on Dell shares with a Sell rating and an \$8.50 target price as we believe BYOD trends in the corporate PC segment will materially pressure Dell's sales, margins and EPS in the future. Accordingly we are at least 10-15% below consensus EPS estimates for 2013 as we see Lenovo and others more aggressively eroding Dell's market share. Our Sell rating is non consensus as 94% of consensus has a buy or hold rating on Dell shares.
- **Key Reason For our Sell Rating** – 1) We believe 2013 & 2014 consensus EPS estimates are too high and we are modeling declines in EPS (consensus expects 2014 EPS to grow) and our estimates are 15% below consensus. 2) Dell's future hardware (PC hardware is total 54% of Dell's total company sales) growth is highly tied to emerging market PC growth which is below corporate average profitability and likely to see more pricing by competitors. 3) BYOD to the enterprise for PCs (following handsets) to threaten Dell who has 63% of its PC sales to tied enterprises. 4) Dell's software solutions are a melting pot of acquisitions which are not fully intergraded in an end-to-end solution like IBM. 5) Dell's PC business is a distraction to management and we believe Dell is unwilling to divest this to focus on non commodity storage and services.
- **Where We Could Be wrong** — 1) Dell could launch appealing tablets which could gain widespread enterprise adoption while posting strong profitability (currently Apple is the only company gaining material tablet traction while posting strong profitability). 2) Competition from Lenovo, HP, Apple, Samsung and others may not be as intense as we expect. 3) The economy could materially improve thereby driving a hiring frenzy where new employees may need new computers. 4) BYOD for enterprise PC could be slowed if there are security breaches in the Citrix, RSA, and remote log in connectivity methods. 5) Dell could more aggressively repurchase stock to help buffer the EPS decline. 6) Dell could make accretive acquisitions especially in the highly fragmented software sector which would boost EPS.
- **Cash Flow & Liquidity** – While we have a Sell rating on Dell, we do not believe the company will experience cash flow or liquidity constraints. Our Sell rating is simply based on our belief that consensus estimates are materially too high.
- **Valuation** – Our target price of \$8.50 is based on 5-6x F12-month EPS 12 months from now of \$1.53 which is in line with the current PE multiple. Our target is mainly based on our below-consensus EPS estimates (13% below the street's FY14 estimate) given our more cautious stance on the overall PC market (Citi is forecasting a 1% yoy unit decline in CY13) as well as further share loss. Our Sell recommendation is a contrarian call given the current sell-side ratings distribution (5% sell ratings).

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
2012A	0.55A	0.54A	0.54A	0.51A	2.13A	2.13A
2013E	0.43A	0.50A	0.41E	0.40E	1.74E	1.75E
Previous	na	na	na	na	na	na
2014E	0.34E	0.39E	0.41E	0.43E	1.58E	1.79E
Previous	na	na	na	na	na	na
2015E	0.34E	0.38E	0.39E	0.40E	1.50E	1.84E
Previous	na	na	na	na	na	na

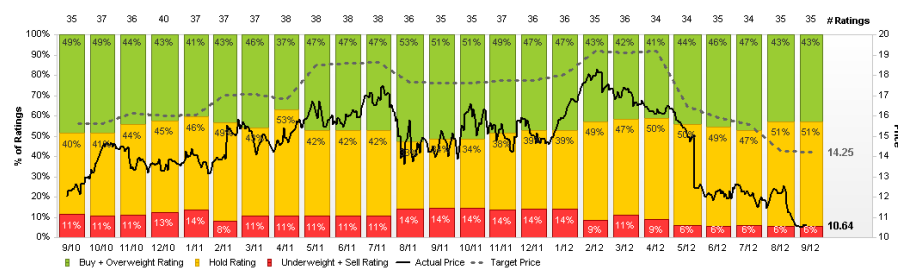
Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

## Recent Results and Outlook

For 2FQ13 (July qtr), Dell reported revenues of \$13.98B (-9% yoy, -3% qoq), below consensus estimate of \$14.68B. The shortfall was largely driven lower than expected notebook shipments. Dell is exiting the low-end of the PC market citing poor margins resulting from price aggression. While gross margins improved 60bps sequentially to 22.6%, roughly 50bps of the improvement was driven by a vendor settlement. Excluding this non-recurring item, gross margins were essentially in line with street expectations. The company was disciplined about operating expenses during the quarter, keeping it relatively flat qoq in line with revenue growth, resulting in an operating margin of 7.8% versus street estimate of 7.2%. Consequently, EPS of \$0.50 came in above consensus \$0.45, although we note that roughly \$0.03 of upside came from lower tax.

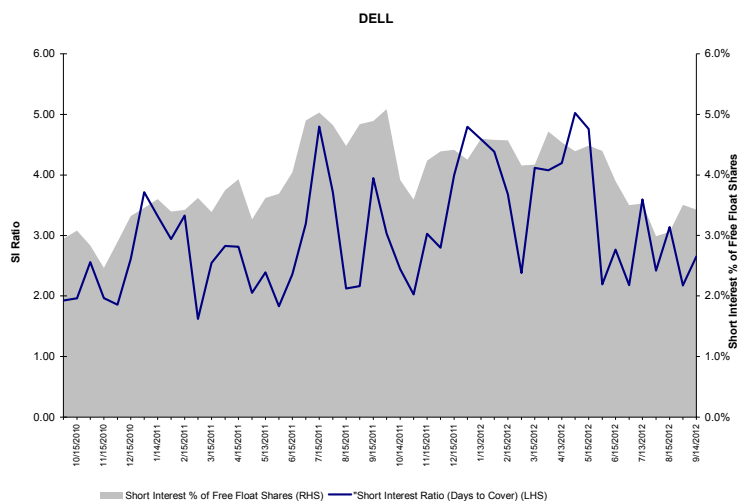
For 3FQ13 (October quarter), the company expects revenues to be down 2-5% sequentially, which suggests sub-seasonal revenue range of \$13.8-14.1B. Dell also lowered its FY13 (January quarter end) EPS target of at least \$2.13 to at least \$1.70 (which includes a \$0.02-\$0.03 dilution from the pending acquisition of Quest). The full-year guidance suggests that revenues will remain sub-seasonal in 4FQ, and gross margins will remain flattish at ~22% (despite a favorable component pricing environment). The outlook reflects caution given the lingering macro concerns and muted expectations going into the Windows 8 release.

Figure 1. DELL Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Figure 2. DELL Short Interest Analysis



Source: FactSet and Citi Research

Figure 3. DELL Income Statement (detailed model available upon request)

Income Statement (DELL)													
Fiscal Year Ends January													
Dollars in Millions													
	FY11	FY12	1QA	2QA	3QE	4QE	FY13E	1QE	2QE	3QE	4QE	FY14E	FY15E
			Apr-12	Jul-12	Oct-12	Jan-13		Apr-13	Jul-13	Oct-13	Jan-14		
<b>Notebook</b>	<b>\$18,971</b>	<b>\$19,104</b>	<b>\$4,236</b>	<b>\$3,870</b>	<b>\$3,713</b>	<b>\$3,821</b>	<b>\$15,640</b>	<b>\$3,592</b>	<b>\$3,520</b>	<b>\$3,662</b>	<b>\$3,768</b>	<b>\$14,542</b>	<b>\$13,979</b>
% change year over year	14%	1%	-10%	-19%	-22%	-22%	-18%	-15%	-9%	-1%	-1%	-7%	-4%
% chg sequentially	-	-	-13%	-9%	-4%	3%	-	-6%	-2%	4%	3%	-	-
<b>Desktop</b>	<b>\$13,489</b>	<b>\$12,929</b>	<b>\$2,970</b>	<b>\$3,106</b>	<b>\$2,764</b>	<b>\$2,789</b>	<b>\$11,629</b>	<b>\$2,677</b>	<b>\$2,758</b>	<b>\$2,560</b>	<b>\$2,737</b>	<b>\$10,732</b>	<b>\$10,369</b>
% change year over year	15%	-4%	-1%	-9%	-11%	-18%	-10%	-10%	-11%	-7%	-2%	-8%	-3%
% chg sequentially	0%	0%	-12%	5%	-11%	1%	0%	-4%	3%	-7%	7%	0%	0%
<b>Server</b>	<b>\$7,209</b>	<b>\$8,036</b>	<b>\$1,947</b>	<b>\$2,267</b>	<b>\$2,339</b>	<b>\$2,484</b>	<b>\$9,036</b>	<b>\$2,282</b>	<b>\$2,436</b>	<b>\$2,514</b>	<b>\$2,673</b>	<b>\$9,905</b>	<b>\$10,647</b>
% change year over year	33%	11%	3%	15%	16%	16%	12%	17%	7%	8%	8%	10%	7%
% chg sequentially	-	-	-9%	16%	3%	6%	-	-8%	7%	3%	6%	-	-
<b>Storage</b>	<b>\$2,295</b>	<b>\$1,943</b>	<b>\$444</b>	<b>\$435</b>	<b>\$413</b>	<b>\$446</b>	<b>\$1,739</b>	<b>\$389</b>	<b>\$438</b>	<b>\$429</b>	<b>\$472</b>	<b>\$1,729</b>	<b>\$1,821</b>
% change year over year	5%	-15%	-8%	-13%	-10%	-11%	-11%	-12%	1%	4%	6%	-1%	5%
% chg sequentially	-	-	-11%	-2%	-5%	8%	-	-13%	13%	-2%	10%	-	-
<b>Software and Peripheral</b>	<b>\$10,261</b>	<b>\$10,222</b>	<b>\$2,386</b>	<b>\$2,338</b>	<b>\$2,268</b>	<b>\$2,036</b>	<b>\$9,029</b>	<b>\$1,995</b>	<b>\$2,034</b>	<b>\$2,142</b>	<b>\$1,928</b>	<b>\$8,099</b>	<b>\$7,228</b>
% change year over year	8%	0%	-7%	-9%	-10%	-20%	-12%	-16%	-13%	-6%	-5%	-10%	-11%
% chg sequentially	-	-	-7%	-2%	-3%	-10%	-	-2%	2%	5%	-10%	-	-
<b>Services</b>	<b>\$7,673</b>	<b>\$8,322</b>	<b>\$2,071</b>	<b>\$2,106</b>	<b>\$2,127</b>	<b>\$2,191</b>	<b>\$8,495</b>	<b>\$2,081</b>	<b>\$2,165</b>	<b>\$2,186</b>	<b>\$2,252</b>	<b>\$8,684</b>	<b>\$8,838</b>
% change year over year	36%	8%	4%	3%	0%	1%	2%	0%	3%	3%	3%	2%	2%
% chg sequentially	-	-	-5%	0%	1%	3%	-	-5%	4%	1%	3%	-	-
<b>Revenue</b>	<b>\$61,494</b>	<b>\$62,071</b>	<b>\$14,422</b>	<b>\$14,483</b>	<b>\$13,980</b>	<b>\$14,106</b>	<b>\$56,991</b>	<b>\$13,334</b>	<b>\$13,669</b>	<b>\$13,814</b>	<b>\$14,146</b>	<b>\$54,963</b>	<b>\$54,119</b>
% change year over year	16%	1%	-4%	-8%	-9%	-12%	-8%	-8%	-6%	-1%	0%	-4%	-2%
% change sequentially	-	-	-10%	0%	-3%	1%	-	-5%	3%	1%	2%	-	-
<b>COGS</b>	<b>\$49,763</b>	<b>\$47,906</b>	<b>\$11,255</b>	<b>\$11,213</b>	<b>\$10,881</b>	<b>\$11,029</b>	<b>\$44,378</b>	<b>\$10,445</b>	<b>\$10,662</b>	<b>\$10,769</b>	<b>\$11,074</b>	<b>\$42,950</b>	<b>\$42,407</b>
<b>Gross Profit (non-GAAP)</b>	<b>\$11,731</b>	<b>\$14,165</b>	<b>\$3,167</b>	<b>\$3,270</b>	<b>\$3,099</b>	<b>\$3,077</b>	<b>\$12,613</b>	<b>\$2,889</b>	<b>\$3,007</b>	<b>\$3,045</b>	<b>\$3,072</b>	<b>\$12,013</b>	<b>\$11,712</b>
SG&A	\$6,594	\$7,812	\$1,828	\$1,791	\$1,775	\$1,774	\$7,167	\$1,736	\$1,752	\$1,753	\$1,760	\$7,002	\$6,922
R&D	\$661	\$856	\$234	\$261	\$265	\$269	\$1,029	\$266	\$270	\$274	\$278	\$1,089	\$1,116
Options Expense	\$327	\$362	\$95	\$95	\$95	\$95	\$380	\$105	\$105	\$105	\$105	\$420	\$460
Total Opex (non-GAAP)	\$7,582	\$9,030	\$2,157	\$2,147	\$2,135	\$2,137	\$8,576	\$2,108	\$2,128	\$2,133	\$2,143	\$8,511	\$8,498
<b>Operating Income (non-GAAP)</b>	<b>\$4,149</b>	<b>\$5,135</b>	<b>\$1,010</b>	<b>\$1,123</b>	<b>\$964</b>	<b>\$940</b>	<b>\$4,036</b>	<b>\$781</b>	<b>\$879</b>	<b>\$912</b>	<b>\$929</b>	<b>\$3,502</b>	<b>\$3,214</b>
D&A	\$970	\$936	\$248	\$281	\$225	\$225	\$979	\$230	\$230	\$230	\$230	\$920	\$920
EBITDA	\$5,119	\$6,071	\$1,258	\$1,404	\$1,189	\$1,165	\$5,015	\$1,011	\$1,109	\$1,142	\$1,159	\$4,422	\$4,134
Net Interest & Other Expense (Income)	\$155	\$191	\$32	\$63	\$43	\$43	\$182	\$43	\$43	\$43	\$42	\$170	\$166
Pretax Income (non-GAAP)	\$3,994	\$4,944	\$978	\$1,060	\$921	\$896	\$3,855	\$739	\$836	\$870	\$887	\$3,331	\$3,048
Provision for Tax	\$888	\$992	\$217	\$185	\$207	\$202	\$811	\$155	\$176	\$183	\$186	\$700	\$640
Effective Tax Rate	22.2%	20.1%	22.2%	17.5%	22.5%	22.5%	21.0%	21.0%	21.0%	21.0%	21.0%	21.0%	21.0%
<b>Net Income (non-GAAP)</b>	<b>\$3,106</b>	<b>\$3,952</b>	<b>\$761</b>	<b>\$875</b>	<b>\$713</b>	<b>\$695</b>	<b>\$3,044</b>	<b>\$584</b>	<b>\$660</b>	<b>\$687</b>	<b>\$700</b>	<b>\$2,632</b>	<b>\$2,408</b>
Preferred Dividends	0	0	0	0	0	0	0	0	0	0	0	0	0
Net Income (GAAP) excl Extra	\$3,106	\$3,952	\$761	\$875	\$713	\$695	\$3,044	\$584	\$660	\$687	\$700	\$2,632	\$2,408
Extraordinary (Loss) or Gain	(\$371)	(\$460)	(\$126)	(\$143)	\$0	\$0	(\$269)	\$0	\$0	\$0	\$0	\$0	\$0
Net Income (GAAP) incl Extra	\$2,735	\$3,492	\$635	\$732	\$713	\$695	\$2,775	\$584	\$660	\$687	\$700	\$2,632	\$2,408
<b>Diluted EPS</b>	<b>\$1.59</b>	<b>\$2.13</b>	<b>\$0.43</b>	<b>\$0.50</b>	<b>\$0.41</b>	<b>\$0.40</b>	<b>\$1.74</b>	<b>\$0.34</b>	<b>\$0.39</b>	<b>\$0.41</b>	<b>\$0.43</b>	<b>\$1.58</b>	<b>\$1.50</b>
Basic Shares Out (M)	1,945	1,839	1,759	1,747	1,727	1,710	1,736	1,692	1,675	1,657	1,640	1,666	1,596
Diluted Shares Out (M)	1,953	1,856	1,774	1,753	1,733	1,716	1,745	1,698	1,681	1,663	1,646	1,671	1,601
Dividend per Common Share	0	\$0.00	\$0.00	\$0.00	\$0.08	\$0.08	\$0.16	\$0.08	\$0.08	\$0.08	\$0.08	\$0.32	\$0.32
Total Dividends	0	\$0	0	0	\$138	\$137	\$275	\$135	\$134	\$133	\$131	\$533	\$511
<b>Percent of Revenue</b>													
Gross Profit	19.1%	22.8%	22.0%	22.6%	22.2%	21.8%	22.1%	21.7%	22.0%	22.0%	21.7%	21.9%	21.6%
SG&A	10.7%	12.6%	12.7%	12.4%	12.7%	12.6%	12.6%	13.0%	12.8%	12.7%	12.4%	12.7%	12.8%
R&D	1.1%	1.4%	1.6%	1.8%	1.9%	1.9%	1.8%	2.0%	2.0%	2.0%	2.0%	2.0%	2.1%
Total Operating Expense	12.3%	14.5%	15.0%	14.8%	15.3%	15.2%	15.0%	15.8%	15.6%	15.4%	15.2%	15.5%	15.7%
Operating Income (non-GAAP)	6.7%	8.3%	7.0%	7.8%	6.9%	6.7%	7.1%	5.9%	6.4%	6.6%	6.6%	6.4%	5.9%
Net Interest & Other Expense	0.3%	0.3%	0.2%	0.4%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%
Pretax Income (non-GAAP)	6.5%	8.0%	6.8%	7.3%	6.6%	6.4%	6.8%	5.5%	6.1%	6.3%	6.3%	6.1%	5.6%
Net Income (non-GAAP)	5.1%	6.4%	5.3%	6.0%	5.1%	4.9%	5.3%	4.4%	4.8%	5.0%	5.0%	4.8%	4.4%
<b>Yr to Yr Chg</b>													
Revenue	16.2%	0.9%	-4.0%	-7.5%	-9.0%	-12.0%	-8.2%	-7.5%	-5.6%	-1.2%	0.3%	-3.6%	-1.5%
Cost of Sales	14.7%	-3.7%	-2.2%	-6.8%	-7.9%	-12.1%	-7.4%	-7.2%	-4.9%	-1.0%	0.4%	-3.2%	-1.3%
SG&A	14.5%	18.5%	-0.7%	-10.9%	-9.1%	-11.7%	-8.3%	-5.0%	-2.2%	-1.2%	-0.8%	-2.3%	-1.1%
R&D	5.9%	29.5%	20.0%	27.3%	20.4%	13.9%	20.2%	13.8%	3.5%	3.5%	3.5%	5.9%	2.5%
Total Operating Expense	13.2%	19.1%	1.0%	-6.5%	-5.5%	-8.7%	-5.0%	-2.3%	-0.9%	-0.1%	0.3%	-0.8%	-0.2%
Operating Income	46.8%	23.8%	-26.6%	-15.4%	-25.2%	-17.8%	-21.4%	-22.6%	-21.7%	-5.3%	-1.2%	-13.3%	-8.2%
Net Income (non-GAAP)	60.0%	27.2%	-27.5%	-13.0%	-27.4%	-23.9%	-23.0%	-23.3%	-24.5%	-3.7%	0.8%	-13.5%	-8.5%
Diluted EPS (non-GAAP)	60.7%	33.9%	-21.4%	-7.2%	-23.5%	-20.4%	-18.1%	-19.9%	-21.3%	0.4%	5.1%	-9.7%	-4.5%

Source: Company reports, Citi Research

Figure 4. DELL Balance Sheet & Cash Flow Statement (detailed model available upon request)

Balance Sheet (DELL)													
Fiscal Year Ends January			1QA		2QA		3QE		4QE				
Dollars in Millions	FY11	FY12	Apr-12	Jul-12	Oct-12	Jan-13	FY13E	1QE	2QE	3QE	4QE	FY14E	FY15E
Cash and equivalents	\$13,913	\$13,852	\$12,814	\$11,519	\$11,580	\$12,135	\$12,135	\$11,818	\$12,192	\$12,546	\$13,239	\$13,239	\$13,928
Short-term investments	\$452	\$966	\$901	\$372	\$372	\$372	\$372	\$372	\$372	\$372	\$372	\$372	\$372
Accounts receivable	\$10,136	\$9,803	\$9,489	\$10,003	\$9,113	\$8,626	\$8,626	\$8,773	\$9,441	\$9,005	\$8,650	\$8,650	\$8,491
Total inventories	\$1,301	\$1,404	\$1,472	\$1,615	\$1,286	\$1,234	\$1,234	\$1,366	\$1,536	\$1,273	\$1,239	\$1,239	\$1,221
Other current	\$3,219	\$3,423	\$3,369	\$3,741	\$2,734	\$3,012	\$3,012	\$3,115	\$3,531	\$2,702	\$3,021	\$3,021	\$2,965
Total Current Assets	\$29,021	\$29,448	\$28,045	\$27,250	\$25,085	\$25,378	\$25,378	\$25,444	\$27,071	\$25,898	\$26,521	\$26,521	\$26,977
PP&E, gross	\$7,763	\$8,870	\$9,113	\$9,333	\$9,508	\$9,708	\$9,708	\$9,883	\$10,058	\$10,258	\$10,458	\$10,458	\$11,258
Accumulated depreciation	(\$5,810)	(\$6,746)	(\$6,994)	(\$7,275)	(\$7,500)	(\$7,725)	(\$7,725)	(\$7,955)	(\$8,185)	(\$8,415)	(\$8,645)	(\$8,645)	(\$9,565)
Goodwill	\$4,365	\$5,838	\$6,005	\$7,558	\$7,558	\$7,558	\$7,558	\$7,558	\$7,558	\$7,558	\$7,558	\$7,558	\$7,558
Intangibles	\$0	\$0	\$1,801	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609
Long-term investments	\$704	\$3,404	\$3,501	\$2,738	\$2,738	\$2,738	\$2,738	\$2,738	\$2,738	\$2,738	\$2,738	\$2,738	\$2,738
Other non-current	\$1,061	\$1,862	\$1,818	\$1,884	\$1,438	\$1,638	\$1,638	\$1,681	\$1,778	\$1,421	\$1,643	\$1,643	\$1,613
Total Assets	\$38,599	\$44,533	\$43,289	\$44,097	\$41,437	\$41,905	\$41,905	\$41,958	\$43,628	\$42,067	\$42,882	\$42,882	\$43,187
Short-term Debt	\$851	\$2,867	\$3,186	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609	\$2,609
Accounts payable	\$11,293	\$11,656	\$10,970	\$11,193	\$10,226	\$10,245	\$10,245	\$10,180	\$10,643	\$10,120	\$10,287	\$10,287	\$10,134
Accrued liabilities	\$4,181	\$3,934	\$3,076	\$3,227	\$3,472	\$3,462	\$3,462	\$2,844	\$3,046	\$3,431	\$3,471	\$3,471	\$3,408
Income taxes payable and others	\$3,158	\$3,544	\$3,582	\$3,683	\$3,153	\$3,118	\$3,118	\$3,312	\$3,476	\$3,115	\$3,127	\$3,127	\$3,070
Total Current Liabilities	\$19,483	\$22,001	\$20,814	\$20,712	\$19,459	\$19,434	\$19,434	\$18,945	\$19,774	\$19,275	\$19,495	\$19,495	\$19,220
Long-term debt	\$5,146	\$6,387	\$5,813	\$5,832	\$5,832	\$5,832	\$5,832	\$5,832	\$5,832	\$5,832	\$5,832	\$5,832	\$5,832
Other long-term liabilities	\$6,204	\$7,228	\$7,305	\$7,807	\$6,124	\$6,360	\$6,360	\$6,754	\$7,368	\$6,052	\$6,378	\$6,378	\$6,261
Total Liabilities	\$30,833	\$35,616	\$33,932	\$34,351	\$31,415	\$31,626	\$31,626	\$31,531	\$32,974	\$31,159	\$31,705	\$31,705	\$31,313
Common stock	\$11,797	\$12,187	\$12,313	\$12,409	\$12,409	\$12,409	\$12,409	\$12,409	\$12,409	\$12,409	\$12,409	\$12,409	\$12,409
Retained earnings	\$24,744	\$28,236	\$28,871	\$29,603	\$30,178	\$30,736	\$30,736	\$31,184	\$31,711	\$32,265	\$32,835	\$32,835	\$34,732
Treasury stock	(\$28,704)	(\$31,445)	(\$31,745)	(\$32,145)	(\$32,445)	(\$32,745)	(\$32,745)	(\$33,045)	(\$33,345)	(\$33,645)	(\$33,945)	(\$33,945)	(\$35,145)
Other	(\$71)	(\$61)	(\$82)	(\$121)	(\$121)	(\$121)	(\$121)	(\$121)	(\$121)	(\$121)	(\$121)	(\$121)	(\$121)
Total Shareholders Equity	\$7,766	\$8,917	\$9,357	\$9,746	\$10,021	\$10,279	\$10,279	\$10,427	\$10,654	\$10,908	\$11,178	\$11,178	\$11,875
Total Liabilities and Equity	\$38,599	\$44,533	\$43,289	\$44,097	\$41,437	\$41,905	\$41,905	\$41,958	\$43,628	\$42,067	\$42,882	\$42,882	\$43,187

Cash Flow Statement (DELL)													
Fiscal Year Ends January													
Dollars in Millions	FY11	FY12	1QA	2QA	3QE	4QE	FY13E	1QE	2QE	3QE	4QE	FY14E	FY15E
			Apr-12	Jul-12	Oct-12	Jan-13		Apr-13	Jul-13	Oct-13	Jan-14		
Net Income	\$2,735	\$3,492	\$635	\$732	\$713	\$695	\$2,775	\$584	\$660	\$687	\$700	\$2,632	\$2,408
Non-cash items:													
Depreciation and amortization	\$970	\$936	\$248	\$281	\$225	\$225	\$979	\$230	\$230	\$230	\$230	\$920	\$920
Tax benefits of employee stock plans	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Special Charges	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Purchased R&D	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Loss (gain) on sale of investments	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Other non-cash gains or (losses)	\$691	\$631	\$190	\$227	\$0	\$0	\$417	\$0	\$0	\$0	\$0	\$0	\$0
Changes in balance sheet accounts:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Operating working capital	(\$427)	\$468	(\$1,211)	(\$603)	\$973	\$236	(\$605)	(\$871)	(\$424)	\$1,029	\$289	\$23	(\$42)
Accounts receivable	\$0	\$0	\$0	(\$633)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Financing receivables	\$0	\$0	\$0	(\$60)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Inventories	\$0	\$0	\$0	(\$122)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Other assets	\$0	\$0	\$0	(\$369)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Accounts payable	\$0	\$0	\$0	\$231	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Deferred services revenue	\$0	\$0	\$0	\$108	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Accrued and other liabilities	\$0	\$0	\$0	\$242	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Non-current assets and liabilities	\$0	\$0	\$0	\$0	(\$1,237)	\$36	(\$1,201)	\$351	\$517	(\$960)	\$105	\$13	(\$87)
Cash Flow from Operations	\$3,969	\$5,527	(\$138)	\$637	\$674	\$1,192	\$2,365	\$294	\$983	\$986	\$1,324	\$3,588	\$3,199
Net capital expenditures	(\$426)	(\$661)	(\$142)	(\$86)	(\$175)	(\$200)	(\$603)	(\$175)	(\$175)	(\$200)	(\$200)	(\$750)	(\$800)
Cash payments for acquisition	(\$376)	(\$2,562)	(\$245)	(\$2,166)	\$0	\$0	(\$2,411)	\$0	\$0	\$0	\$0	\$0	\$0
Cash assumed in DFS consolidation	\$20	\$278	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Purchase of assets held in lease facilities	(\$381)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Net purchases of investments	(\$2)	(\$3,221)	\$22	\$1,330	\$0	\$0	\$1,352	\$0	\$0	\$0	\$0	\$0	\$0
Cash Flow from Investing	(\$1,165)	(\$6,166)	(\$365)	(\$922)	(\$175)	(\$200)	(\$1,662)	(\$175)	(\$175)	(\$200)	(\$200)	(\$750)	(\$800)
Change in short-term debt	(\$176)	\$635	\$13	\$125	\$0	\$0	\$138	\$0	\$0	\$0	\$0	\$0	\$0
Change in long-term debt	\$1,439	\$2,615	(\$267)	(\$686)	\$0	\$0	(\$953)	\$0	\$0	\$0	\$0	\$0	\$0
Common issued under employee plans	\$12	\$40	\$38	\$6	\$0	\$0	\$44	\$0	\$0	\$0	\$0	\$0	\$0
Stock repurchases	(\$800)	(\$2,717)	(\$324)	(\$400)	(\$300)	(\$300)	(\$1,324)	(\$300)	(\$300)	(\$300)	(\$300)	(\$1,200)	(\$1,200)
Dividends	\$0	\$0	\$0	\$0	(\$138)	(\$137)	(\$275)	(\$135)	(\$134)	(\$133)	(\$131)	(\$533)	(\$511)
Other	\$2	\$4	\$8	\$0	\$0	\$0	\$8	\$0	\$0	\$0	\$0	\$0	\$0
Cash Flow from Financing	\$477	\$577	(\$532)	(\$955)	(\$438)	(\$437)	(\$2,362)	(\$435)	(\$434)	(\$433)	(\$431)	(\$1,733)	(\$1,711)
Effect of Exchange Rate on Cash	(\$3)	\$1	(\$3)	(\$55)	\$0	\$0	(\$58)	\$0	\$0	\$0	\$0	\$0	\$0
Net Change in Cash	\$3,278	(\$61)	(\$1,038)	(\$1,295)	\$61	\$555	(\$1,717)	(\$316)	\$374	\$354	\$693	\$1,105	\$688
Beginning cash balance	\$10,635	\$13,913	\$13,852	\$12,814	\$11,519	\$11,580	\$13,852	\$12,135	\$11,818	\$12,192	\$12,546	\$12,135	\$13,239
Ending Cash Balance	\$13,913	\$13,852	\$12,814	\$11,519	\$11,580	\$12,135	\$12,135	\$11,818	\$12,192	\$12,546	\$13,239	\$13,239	\$13,928

Source: Company report, Citi Research

## Company Focus

- Company Update
- Initiation of Coverage

<b>Sell</b>	<b>3</b>
Price (05 Oct 12)	US\$14.73
Target price	US\$13.50
Expected share price return	-8.4%
Expected dividend yield	3.5%
<b>Expected total return</b>	<b>-4.8%</b>
Market Cap	US\$28,962M

### Price Performance (RIC: HPQ.N, BB: HPQ US)



## Hewlett-Packard Co (HPQ)

### A Company That Needs Clear Strategic Direction & Leadership

- **Stock Call** — We are initiating on HPQ shares with a Sell rating and a \$13.50 target price. We believe consensus EPS estimates are too aggressive for both 2013 and 2014. We believe the company is too optimistic in its PC & printing forecast of flat to up 1% through 2015 as we are concerned Lenovo will surpass HP as the #1 PC market share company and pressure HP's margins. We also fear HP will continue to lose more services opportunities given its heavy restructuring and management turnover. We see Lenovo aggressively moving into HP's market. We note the stock is one of the weakest IT hardware performing stocks in 2012 with investor sentiment quite negative with short interest at all time levels so the sell rating may take a while for the stock keep going lower.
- **What Would Make Us More Positive** — 1) Clear progress in delivering sales and EPS growth by the company's new management team, 2) An announcement to either divest its printer and / or PC segment as we view both as a distraction to management and we believe HP is unwilling to divest this to focus on non commodity storage and services. 3) If HP could fully integrate into an end-to-end solution its services which currently are a melting pot of acquisitions (took a \$9 billion write off in August 2012) which are not fully intergraded in an end-to-end solution like IBM. 4) An appealing tablet product portfolio that gains material traction while posting strong profitability (currently Apple is the only company gaining material traction while posting strong profitability).
- **What Would Make Us More Negative** — 1) Continued share loss in services, 2) A renewed focus on the company's PC and printer segments which ambitions to keep or grow market share which could pressure on pricing, margins, and EPS, 3) A reduction in the company's dividend which would create cash flow generation concerns, 4) Additional senior management turnover.
- **Cash Flow & Liquidity** — While we have a Sell rating on HP, we do not believe the company will experience cash flow or liquidity constraints. Our Sell rating is simply based on our belief that consensus estimates are materially too high.
- **Valuation** — Our target price of \$13.50 is based on 4x F12-month EPS 12 months from now of \$3.42, which is in line with the current PE multiple. We are materially below consensus for 2013 and 2014 given our view that HP will see more competition (Lenovo, Accenture, IBM) and a more challenging economy resulting in greater than expected margin pressure. Historically HP has been able to help boost revenues via acquisitions and help EPS with aggressive stock buy back but we believe both will materially slow given the company's debt structure and need to reinvest into HP core operations. Our Sell recommendation is a contrarian call given the current sell-side ratings distribution (52% hold, 30% buy, 18% sell ratings).

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
2011A	1.36A	1.24A	1.10A	1.17A	4.89A	4.88A
2012E	0.92A	0.98A	1.00A	1.16E	4.05E	4.05E
Previous	na	na	na	na	na	na
2013E	0.86E	0.82E	0.78E	0.94E	3.40E	3.81E
Previous	na	na	na	na	na	na
2014E	0.80E	0.82E	0.81E	0.99E	3.42E	4.10E
Previous	na	na	na	na	na	na

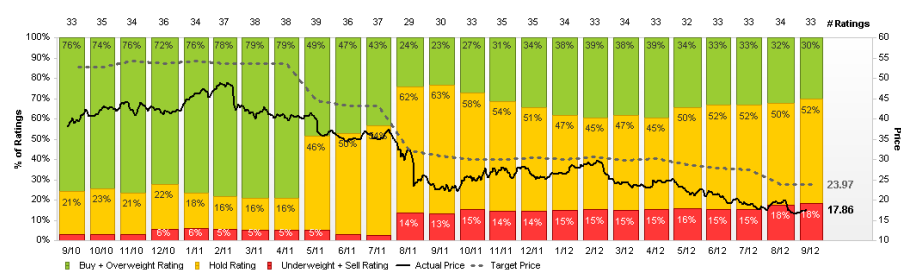
Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

## Recent Results and Outlook

For 3FQ12 (July quarter ending), HP reported revenues of \$29.7B (-5% yoy, -3% qoq), below the consensus estimate of \$30.2B. While the bulk of the downside was driven by weakness in PCs, all other segments (with the exception of IPG) also came in below expectations. It is interesting to note that the upside in IPG (imaging and printing) was not a result of strong demand, rather a result of less-than-expected drawdown in channel inventory. Management cited elevated levels of channel inventory in both PSG and IPG due to persistent weakness in consumer. Gross margin of 23.4% was modestly above consensus estimate of 23.3% mainly due to sequential improvement in IPG margins. After reflecting the announced opex reductions resulting from restructuring, the non-GAAP EPS came in at \$1.00, in line with the pre-announcement on Aug 8<sup>th</sup> and we note that consensus EPS prior to the pre-announcement was \$0.97 (note HP took a \$9 billion write off from prior acquisition write downs at the time of the Aug 8<sup>th</sup> pre announcement).

Despite the slightly better EPS in F3Q, the company is now guiding FY12 non-GAAP EPS to come in at the low-end of their previous \$4.05-\$4.07 guidance. This implies that the company is projecting revenues to be sub-seasonal in 4FQ12 (Oct qtr) at roughly +6% qoq versus historical double digit growth. The caution appears to be based on continued weakness in PCs and printing, especially in the consumer sector. Given that holiday PC builds generally start to occur in Sep/Oct, HP's Oct qtr guidance reflects muted expectations for the Windows 8 launch.

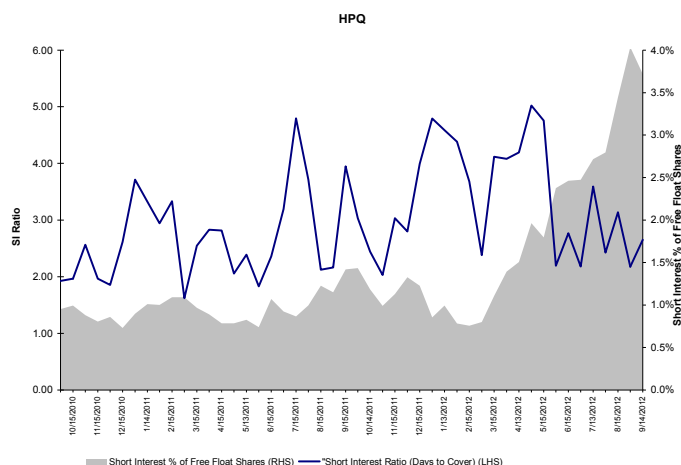
Figure 1. HPQ Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

HPQ short interest is at all time high levels thereby creating a potential short covering boost to the shares on any good news.

Figure 2. HPQ Short Interest Analysis



Source: FactSet and Citi Research



Figure 3. HPQ Income Statement (detailed model available upon request)

Income Statement (HPQ)													
Fiscal Year Ends October													
Dollars in Millions													
	FY10	FY11	1Q	2Q	3Q	4Q	FY12E	1Q	2Q	3Q	4Q	FY13E	FY14E
			Jan-12	Apr-12	Jul-12	Oct-12		Jan-13	Apr-13	Jul-13	Oct-13		
<b>Imaging and Printing</b>	<b>\$25,764</b>	<b>\$25,783</b>	<b>\$6,258</b>	<b>\$6,132</b>	<b>\$6,017</b>	<b>\$6,595</b>	<b>\$25,002</b>	<b>\$6,004</b>	<b>\$6,037</b>	<b>\$5,512</b>	<b>\$6,173</b>	<b>\$23,726</b>	<b>\$22,789</b>
% chg yr to yr	7.3%	0.1%	-5.6%	-9.1%	-1.1%	4.3%	-3.0%	-4.1%	-1.5%	-8.4%	-6.4%	-5.1%	-3.9%
% chg qtr to qtr	-	-	-1.0%	-2.0%	-1.9%	9.6%	-	-9.0%	0.6%	-8.7%	12.0%	-	-
<b>PSG</b>	<b>\$40,741</b>	<b>\$39,574</b>	<b>\$8,979</b>	<b>\$9,452</b>	<b>\$8,620</b>	<b>\$9,048</b>	<b>\$36,099</b>	<b>\$8,681</b>	<b>\$8,275</b>	<b>\$8,360</b>	<b>\$8,779</b>	<b>\$34,095</b>	<b>\$33,081</b>
% chg yr to yr	15.4%	-2.9%	-14.1%	0.4%	-10.1%	-10.6%	-8.8%	-3.3%	-12.4%	-3.0%	-3.0%	-5.6%	-3.0%
% chg qtr to qtr	-	-	-11.3%	5.3%	-8.8%	5.0%	-	-4.1%	-4.7%	1.0%	5.0%	-	-
<b>Enterprise Server and Storage</b>	<b>\$20,356</b>	<b>\$22,241</b>	<b>\$5,018</b>	<b>\$5,211</b>	<b>\$5,143</b>	<b>\$5,572</b>	<b>\$20,944</b>	<b>\$5,170</b>	<b>\$4,745</b>	<b>\$4,852</b>	<b>\$5,196</b>	<b>\$19,963</b>	<b>\$19,811</b>
% chg yr to yr	26.3%	9.3%	-10.9%	-6.2%	-4.7%	-1.5%	-5.8%	3.0%	-8.9%	-5.7%	-6.7%	-4.7%	-0.8%
% chg qtr to qtr	-	-	-11.3%	3.8%	-1.3%	8.3%	-	-7.2%	-8.2%	2.3%	7.1%	-	-
<b>Software</b>	<b>\$2,729</b>	<b>\$3,217</b>	<b>\$946</b>	<b>\$970</b>	<b>\$973</b>	<b>\$1,133</b>	<b>\$4,022</b>	<b>\$1,019</b>	<b>\$1,043</b>	<b>\$1,044</b>	<b>\$1,199</b>	<b>\$4,305</b>	<b>\$4,599</b>
% chg yr to yr	2.8%	17.9%	35.7%	27.0%	24.7%	16.1%	25.0%	7.7%	7.6%	7.3%	5.8%	7.0%	6.8%
% chg qtr to qtr	-	-	-3.1%	2.5%	0.3%	16.5%	-	-10.1%	2.4%	0.1%	14.8%	-	-
<b>Services</b>	<b>\$35,529</b>	<b>\$35,954</b>	<b>\$8,626</b>	<b>\$8,831</b>	<b>\$8,754</b>	<b>\$9,044</b>	<b>\$35,255</b>	<b>\$8,274</b>	<b>\$8,282</b>	<b>\$8,142</b>	<b>\$8,381</b>	<b>\$33,078</b>	<b>\$32,956</b>
% chg yr to yr	0.4%	1.2%	0.2%	-1.6%	-3.7%	-2.6%	-1.9%	-4.1%	-6.2%	-7.0%	-7.3%	-6.2%	-0.4%
% chg qtr to qtr	-	-	-7.1%	2.4%	-0.9%	3.3%	-	-8.5%	0.1%	-1.7%	2.9%	-	-
<b>Financing</b>	<b>\$3,047</b>	<b>\$3,596</b>	<b>\$950</b>	<b>\$968</b>	<b>\$935</b>	<b>\$958</b>	<b>\$3,811</b>	<b>\$930</b>	<b>\$930</b>	<b>\$920</b>	<b>\$930</b>	<b>\$3,709</b>	<b>\$3,707</b>
% chg yr to yr	14.0%	18.0%	14.9%	9.4%	0.3%	0.7%	6.0%	-2.1%	-4.0%	-1.6%	-3.0%	-2.7%	-0.1%
% chg qtr to qtr	-	-	-0.2%	1.9%	-3.4%	2.5%	-	-3.0%	0.0%	-1.0%	1.0%	-	-
<b>Total Revenue</b>	<b>\$126,033</b>	<b>\$127,387</b>	<b>\$30,036</b>	<b>\$30,693</b>	<b>\$29,669</b>	<b>\$31,498</b>	<b>\$121,896</b>	<b>\$29,356</b>	<b>\$28,479</b>	<b>\$27,997</b>	<b>\$29,740</b>	<b>\$115,572</b>	<b>\$113,604</b>
% chg year over year	10%	1%	-7%	-3%	-5%	-2%	-4%	-2%	-7%	-6%	-6%	-5%	-2%
% chg qtr to qtr	0%	0%	-7%	2%	-3%	6%	0%	-7%	-3%	-2%	6%	0%	0%
Cost of Sales	\$95,956	\$96,916	\$23,313	\$23,577	\$22,712	\$24,023	\$93,625	\$22,801	\$22,046	\$21,668	\$22,916	\$89,430	\$87,644
Restructuring Savings	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<b>Gross Profit</b>	<b>\$30,077</b>	<b>\$30,471</b>	<b>\$6,723</b>	<b>\$7,116</b>	<b>\$6,957</b>	<b>\$7,475</b>	<b>\$28,271</b>	<b>\$6,555</b>	<b>\$6,434</b>	<b>\$6,329</b>	<b>\$6,824</b>	<b>\$26,141</b>	<b>\$25,960</b>
R&D	\$2,959	\$3,254	\$786	\$850	\$854	\$815	\$3,305	\$825	\$893	\$897	\$856	\$3,470	\$3,644
SG&A	\$12,050	\$12,779	\$3,167	\$3,340	\$3,166	\$3,282	\$12,955	\$3,150	\$3,087	\$3,065	\$3,214	\$12,516	\$12,324
Restructuring Savings	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Options Expense	\$668	\$687	\$200	\$200	\$200	\$200	\$800	\$200	\$200	\$200	\$200	\$800	\$800
Total Operating Expenses	\$15,677	\$16,720	\$4,153	\$4,390	\$4,220	\$4,297	\$17,060	\$4,176	\$4,180	\$4,162	\$4,270	\$16,787	\$16,767
<b>Operating Income</b>	<b>\$14,400</b>	<b>\$13,751</b>	<b>\$2,570</b>	<b>\$2,726</b>	<b>\$2,737</b>	<b>\$3,178</b>	<b>\$11,211</b>	<b>\$2,379</b>	<b>\$2,254</b>	<b>\$2,167</b>	<b>\$2,554</b>	<b>\$9,355</b>	<b>\$9,193</b>
Depr and amort	\$4,820	\$4,984	\$1,303	\$1,285	\$1,306	\$1,280	\$5,174	\$1,150	\$1,150	\$1,150	\$1,150	\$4,600	\$4,600
EBITDA	\$19,220	\$18,735	\$3,873	\$4,011	\$4,043	\$4,458	\$16,385	\$3,529	\$3,404	\$3,317	\$3,704	\$13,955	\$13,793
Other (Income) Expense	\$393	\$419	\$221	\$243	\$224	\$275	\$963	\$200	\$200	\$200	\$200	\$800	\$600
Pretax Income	\$14,007	\$13,332	\$2,349	\$2,483	\$2,513	\$2,903	\$10,248	\$2,179	\$2,054	\$1,967	\$2,354	\$8,555	\$8,593
Provision for Taxes	\$3,068	\$2,953	\$517	\$534	\$540	\$624	\$2,215	\$479	\$452	\$433	\$518	\$1,882	\$1,890
Effective Tax Rate	21.9%	22.1%	22.0%	21.5%	21.5%	21.5%	21.6%	22.0%	22.0%	22.0%	22.0%	22.0%	22.0%
<b>Non-GAAP Net Income</b>	<b>\$10,939</b>	<b>\$10,379</b>	<b>\$1,832</b>	<b>\$1,949</b>	<b>\$1,973</b>	<b>\$2,279</b>	<b>\$8,033</b>	<b>\$1,700</b>	<b>\$1,602</b>	<b>\$1,534</b>	<b>\$1,836</b>	<b>\$6,673</b>	<b>\$6,702</b>
Reported GAAP Net Income	\$8,761	\$7,074	\$1,468	\$1,593	(\$8,857)	\$1,919	(\$3,877)	\$1,340	\$1,242	\$1,174	\$1,476	\$5,233	\$5,262
<b>Non-GAAP Diluted EPS</b>	<b>\$4.61</b>	<b>\$4.87</b>	<b>\$0.92</b>	<b>\$0.98</b>	<b>\$1.00</b>	<b>\$1.16</b>	<b>\$4.05</b>	<b>\$0.86</b>	<b>\$0.82</b>	<b>\$0.78</b>	<b>\$0.94</b>	<b>\$3.40</b>	<b>\$3.42</b>
GAAP Diluted EPS	\$3.69	\$3.33	\$0.73	\$0.80	(\$4.49)	\$0.97	(\$1.96)	\$0.68	\$0.63	\$0.60	\$0.75	\$2.66	\$2.68
Basic Shares Outstanding	2,319	2,094	1,981	1,979	1,971	1,972	1,976	1,965	1,964	1,963	1,963	1,964	1,960
Diluted Shares Outstanding	2,377	2,124	1,998	1,987	1,971	1,972	1,981	1,965	1,964	1,963	1,963	1,964	1,960
Dividend per Common Share	\$0.32	\$0.40	\$0.12	\$0.12	\$0.13	\$0.13	\$0.50	\$0.13	\$0.13	\$0.13	\$0.13	\$0.52	\$0.52
Dividend Payout	\$742	\$838	\$238	\$237	\$256	\$256	\$988	\$255	\$255	\$255	\$255	\$1,021	\$1,019
<b>Percent of Revenue</b>													
Gross Margin	23.9%	23.9%	22.4%	23.2%	23.4%	23.7%	23.2%	22.3%	22.6%	22.6%	22.9%	22.6%	22.9%
R&D	2.3%	2.6%	2.6%	2.8%	2.9%	2.6%	2.7%	2.8%	3.1%	3.2%	2.9%	3.0%	3.2%
SG&A	9.6%	10.0%	10.5%	10.9%	10.7%	10.4%	10.6%	10.7%	10.8%	10.9%	10.8%	10.8%	10.8%
Options Expense	0.5%	0.5%	0.7%	0.7%	0.7%	0.6%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%
Total Op Ex (excluding Options Exp)	11.9%	12.6%	13.2%	13.7%	13.5%	13.0%	13.3%	13.5%	14.0%	14.2%	13.7%	13.8%	14.1%
Operating Income	12.0%	11.3%	9.2%	9.5%	9.9%	10.7%	9.9%	8.8%	8.6%	8.5%	9.3%	8.8%	8.8%
Net Income	8.7%	8.1%	6.1%	6.3%	6.7%	7.2%	6.6%	5.8%	5.6%	5.5%	6.2%	5.8%	5.9%
<b>% Change Year to Year</b>													
Total Revenue	10.0%	1.1%	-7.0%	-3.0%	-4.9%	-2.4%	-4.3%	-2.3%	-7.2%	-5.6%	-5.6%	-5.2%	-1.7%
Total Revenue, CC	8.3%	0.0%	-8.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Cost of Sales	9.7%	1.0%	-4.5%	-1.2%	-5.1%	-2.8%	-3.4%	-2.2%	-6.5%	-4.6%	-4.6%	-4.5%	-2.0%
R&D	5.0%	10.0%	-1.5%	4.3%	5.2%	-1.7%	1.6%	5.0%	5.0%	5.0%	5.0%	5.0%	5.0%
SG&A	9.2%	6.0%	8.8%	2.8%	-2.6%	-2.5%	1.4%	-0.5%	-7.6%	-3.2%	-2.1%	-3.4%	-1.5%
Options Expense	9.0%	2.8%	11.1%	36.1%	33.3%	-4.8%	16.4%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Total Op Ex (excluding Options Exp)	8.3%	6.8%	6.6%	3.1%	-1.1%	-2.4%	1.4%	0.6%	-5.0%	-1.5%	-0.7%	-1.7%	-0.1%
Operating Income	14.3%	-4.5%	-35.8%	-23.4%	-10.1%	1.2%	-18.5%	-7.4%	-17.3%	-20.8%	-19.6%	-16.6%	-1.7%
Pretax Income	18.0%	-4.8%	-39.9%	-28.7%	-14.1%	-3.7%	-23.1%	-7.2%	-17.3%	-21.7%	-18.9%	-16.5%	0.4%
Net Income	16.3%	-5.1%	-39.5%	-28.3%	-13.5%	-3.0%	-22.6%	-7.2%	-17.8%	-22.2%	-19.4%	-16.9%	0.4%
Diluted EPS excl Extra	19.7%	5.7%	-32.6%	-21.2%	-8.8%	-1.4%	-16.8%	-5.7%	-16.8%	-21.9%	-19.1%	-16.2%	0.6%

Source: Company report, Citi Research

Figure 4. HPQ Balance Sheet & Cash Flow

<b>Balance Sheet (HPQ)</b>												
Fiscal Year Ends October												
Dollars in Millions												
	FY10	FY11	1Q	2Q	3Q	4Q	FY12E	1QE	2QE	3QE	4QE	FY13E
			Jan-12	Apr-12	Jul-12	Oct-12		Jan-13	Apr-13	Jul-13	Oct-13	
Cash and ST Investments	\$10,929	\$8,043	\$8,113	\$8,311	\$9,509	\$12,434	\$12,434	\$12,118	\$12,110	\$14,501	\$16,967	\$16,967
Trade Accounts Receivable	\$18,481	\$18,224	\$15,892	\$16,609	\$15,686	\$17,791	\$17,791	\$15,532	\$15,411	\$14,802	\$16,798	\$16,798
Financing Receivables	\$2,986	\$3,162	\$3,123	\$3,139	\$3,116	\$3,183	\$3,183	\$3,056	\$3,015	\$3,067	\$3,087	\$3,087
Total Inventories	\$6,466	\$7,490	\$7,271	\$7,306	\$7,292	\$7,312	\$7,312	\$7,106	\$6,779	\$6,881	\$6,904	\$6,904
Deferred Income Taxes	\$4,144	\$4,743	\$2,850	\$3,381	\$4,075	\$4,569	\$4,569	\$2,644	\$2,797	\$3,190	\$3,705	\$3,705
Other	\$11,173	\$9,359	\$11,500	\$10,943	\$10,559	\$9,136	\$9,136	\$11,239	\$10,154	\$9,964	\$8,626	\$8,626
<b>Total Current Assets</b>	<b>\$54,184</b>	<b>\$51,021</b>	<b>\$48,749</b>	<b>\$49,689</b>	<b>\$50,237</b>	<b>\$54,426</b>	<b>\$54,426</b>	<b>\$51,696</b>	<b>\$50,265</b>	<b>\$52,405</b>	<b>\$56,088</b>	<b>\$56,088</b>
PP&E, net	\$11,763	\$12,292	\$12,122	\$12,236	\$12,069	\$12,239	\$12,239	\$12,589	\$12,939	\$13,289	\$13,639	\$13,639
Long-term Investments & Other	\$12,225	\$10,755	\$11,057	\$11,018	\$10,479	\$10,500	\$10,500	\$10,807	\$10,223	\$9,889	\$9,914	\$9,914
Goodwill	\$38,481	\$44,549	\$44,638	\$44,936	\$36,801	\$36,351	\$36,351	\$35,901	\$35,451	\$35,001	\$34,551	\$34,551
Purchased Intangibles	\$7,850	\$10,900	\$10,030	\$9,810	\$7,970	\$7,970	\$7,970	\$7,970	\$7,970	\$7,970	\$7,970	\$7,970
<b>Total Assets</b>	<b>\$124,503</b>	<b>\$129,517</b>	<b>\$126,596</b>	<b>\$127,689</b>	<b>\$117,556</b>	<b>\$121,485</b>	<b>\$121,485</b>	<b>\$118,962</b>	<b>\$116,849</b>	<b>\$118,553</b>	<b>\$122,162</b>	<b>\$122,162</b>
Notes Payable & S/T Borrowings	\$7,046	\$8,083	\$5,438	\$4,252	\$5,681	\$5,681	\$5,681	\$5,681	\$5,681	\$5,681	\$5,681	\$5,681
Accounts Payable	\$14,365	\$14,750	\$12,375	\$12,900	\$12,554	\$14,335	\$14,335	\$12,103	\$12,062	\$11,977	\$13,674	\$13,674
Employee Comp & Benefits	\$4,256	\$3,999	\$3,136	\$3,609	\$3,701	\$3,898	\$3,898	\$3,119	\$3,336	\$3,583	\$3,817	\$3,817
Deferred Taxes	\$802	\$1,048	\$929	\$871	\$712	\$1,009	\$1,009	\$862	\$721	\$557	\$819	\$819
Deferred Revenue	\$6,727	\$7,449	\$7,530	\$7,582	\$7,598	\$7,272	\$7,272	\$7,359	\$7,035	\$7,170	\$6,866	\$6,866
Accrued Restructuring	\$95	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Other Accrued Liabilities	\$16,112	\$15,113	\$14,885	\$13,585	\$14,673	\$14,754	\$14,754	\$14,548	\$12,605	\$13,846	\$13,931	\$13,931
<b>Total Current Liabilities</b>	<b>\$49,403</b>	<b>\$50,442</b>	<b>\$44,293</b>	<b>\$42,799</b>	<b>\$44,919</b>	<b>\$46,949</b>	<b>\$46,949</b>	<b>\$43,673</b>	<b>\$41,440</b>	<b>\$42,814</b>	<b>\$44,788</b>	<b>\$44,788</b>
Other LT Debt	\$15,258	\$22,551	\$25,462	\$25,825	\$24,063	\$24,063	\$24,063	\$24,063	\$24,063	\$24,063	\$24,063	\$24,063
Other Liabilities	\$19,061	\$17,520	\$17,269	\$17,368	\$16,564	\$17,104	\$17,104	\$16,878	\$16,115	\$15,631	\$16,149	\$16,149
<b>Total Liabilities</b>	<b>\$83,722</b>	<b>\$90,513</b>	<b>\$87,024</b>	<b>\$85,992</b>	<b>\$85,546</b>	<b>\$88,116</b>	<b>\$88,116</b>	<b>\$84,613</b>	<b>\$81,618</b>	<b>\$82,508</b>	<b>\$85,000</b>	<b>\$85,000</b>
<b>Stockholders' Equity</b>	<b>\$40,781</b>	<b>\$39,004</b>	<b>\$39,572</b>	<b>\$41,697</b>	<b>\$32,010</b>	<b>\$33,369</b>	<b>\$33,369</b>	<b>\$34,349</b>	<b>\$35,231</b>	<b>\$36,045</b>	<b>\$37,162</b>	<b>\$37,162</b>
<b>Total Liabilities &amp; Equity</b>	<b>\$124,503</b>	<b>\$129,517</b>	<b>\$126,596</b>	<b>\$127,689</b>	<b>\$117,556</b>	<b>\$121,485</b>	<b>\$121,485</b>	<b>\$118,962</b>	<b>\$116,849</b>	<b>\$118,553</b>	<b>\$122,162</b>	<b>\$122,162</b>
<b>Cash Flow Statement (HPQ)</b>												
Fiscal Year Ends October												
Dollars in Millions												
	FY10	FY11	1Q	2Q	3Q	4Q	FY12E	1QE	2QE	3QE	4QE	FY13E
			Jan-12	Apr-12	Jul-12	Oct-12		Jan-13	Apr-13	Jul-13	Oct-13	
Net Income	\$8,761	\$7,074	\$1,468	\$1,593	(\$8,857)	\$1,919	(\$3,877)	\$1,340	\$1,242	\$1,174	\$1,476	\$5,233
Depreciation	\$3,336	\$3,377	\$837	\$815	\$830	\$830	\$3,312	\$700	\$700	\$700	\$700	\$2,800
Amortization of goodwill and intangibles	\$1,484	\$1,607	\$466	\$470	\$476	\$450	\$1,862	\$450	\$450	\$450	\$450	\$1,800
Impairment losses on investments	\$0	\$885	\$0	\$0	\$9,188	\$0	\$9,188	\$0	\$0	\$0	\$0	\$0
Deferred taxes	(\$191)	\$166	(\$110)	(\$45)	(\$535)	\$297	(\$393)	(\$148)	(\$141)	(\$163)	\$261	(\$191)
Provision for doubtful accounts - A/R	\$51	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Provision for inventory	\$294	\$298	\$52	\$95	\$107	\$0	\$254	\$0	\$0	\$0	\$0	\$0
Tax benefit on employee options	(\$294)	(\$163)	(\$11)	(\$1)	\$0	\$0	(\$12)	\$0	\$0	\$0	\$0	\$0
Restructuring charges	\$1,144	\$645	\$40	\$53	\$1,795	\$0	\$1,888	\$0	\$0	\$0	\$0	\$0
Acquisition-related charges	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Other non-cash items	\$1,225	\$639	\$219	\$365	\$240	\$0	\$824	\$0	\$0	\$0	\$0	\$0
<b>Balance Sheet Items</b>												
Accounts receivable	(\$2,398)	(\$227)	\$2,311	(\$832)	\$956	(\$2,105)	\$330	\$2,259	\$121	\$609	(\$1,996)	\$993
Inventories	(\$270)	(\$1,252)	\$180	(\$91)	(\$91)	(\$20)	(\$22)	\$206	\$327	(\$102)	(\$23)	\$408
Accounts payable	(\$698)	\$275	(\$2,376)	\$525	(\$345)	\$1,781	(\$415)	(\$2,232)	(\$41)	(\$85)	\$1,697	(\$661)
Taxes on earnings	\$723	\$610	(\$12)	(\$42)	\$14	\$0	(\$40)	\$0	\$0	\$0	\$0	\$0
Other current assets and liabilities	\$84	(\$293)	(\$1,697)	(\$332)	(\$734)	\$1,665	(\$1,098)	(\$1,182)	\$386	(\$441)	\$1,576	\$339
Other, net	(\$1,329)	(\$1,002)	(\$174)	(\$100)	(\$198)	(\$245)	(\$717)	(\$119)	(\$2,267)	\$1,376	(\$219)	(\$1,230)
<b>Cash Flows from Operations</b>	<b>\$11,922</b>	<b>\$12,639</b>	<b>\$1,193</b>	<b>\$2,473</b>	<b>\$2,846</b>	<b>\$4,572</b>	<b>\$11,084</b>	<b>\$1,274</b>	<b>\$778</b>	<b>\$3,518</b>	<b>\$3,922</b>	<b>\$9,491</b>
Purchase of PP&E	(\$4,133)	(\$4,539)	(\$883)	(\$1,080)	(\$870)	(\$1,150)	(\$3,983)	(\$1,200)	(\$1,200)	(\$1,200)	(\$1,200)	(\$4,800)
Proceeds from sale of PP&E	\$602	\$999	\$96	\$128	\$97	\$150	\$471	\$150	\$150	\$150	\$150	\$600
Purchase of available-for-sale Investments	(\$48)	(\$41)	\$96	(\$565)	(\$228)	(\$88)	(\$785)	(\$180)	\$625	\$282	(\$45)	\$682
Maturity and sale of investments	\$197	\$13	\$0	\$250	\$170	\$0	\$420	\$0	\$0	\$0	\$0	\$0
Acquisitions	(\$8,109)	(\$10,480)	(\$141)	\$0	\$0	\$0	(\$141)	\$0	\$0	\$0	\$0	\$0
Net proceeds from divestitures	\$7	\$89	\$81	\$0	\$0	\$0	\$81	\$0	\$0	\$0	\$0	\$0
Other	\$125	\$0	\$0	\$0	\$6	\$0	\$6	\$0	\$0	\$0	\$0	\$0
<b>Cash Flows from Investing</b>	<b>(\$11,359)</b>	<b>(\$13,959)</b>	<b>(\$751)</b>	<b>(\$1,267)</b>	<b>(\$825)</b>	<b>(\$1,088)</b>	<b>(\$3,931)</b>	<b>(\$1,230)</b>	<b>(\$425)</b>	<b>(\$768)</b>	<b>(\$1,095)</b>	<b>(\$3,518)</b>
Repayment of comm paper & notes payable	\$4,156	(\$1,270)	(\$2,607)	(\$185)	\$239	\$0	(\$2,553)	\$0	\$0	\$0	\$0	\$0
Issuance and payment of debt, net	\$1,833	\$9,606	\$2,935	(\$544)	(\$513)	\$0	\$1,878	\$0	\$0	\$0	\$0	\$0
Issuance of common stock	\$2,617	\$896	\$313	\$321	\$76	\$0	\$710	\$0	\$0	\$0	\$0	\$0
Repurchase of common stock	(\$11,042)	(\$10,117)	(\$780)	(\$350)	(\$365)	(\$300)	(\$1,795)	(\$100)	(\$100)	(\$100)	(\$100)	(\$400)
Dividends	(\$771)	(\$844)	(\$244)	(\$251)	(\$260)	(\$260)	(\$1,015)	(\$260)	(\$260)	(\$260)	(\$260)	(\$1,040)
Other	\$294	\$163	\$11	\$1	\$0	\$0	\$12	\$0	\$0	\$0	\$0	\$0
<b>Cash Flows from Financing</b>	<b>(\$2,913)</b>	<b>(\$1,566)</b>	<b>(\$372)</b>	<b>(\$1,008)</b>	<b>(\$823)</b>	<b>(\$560)</b>	<b>(\$2,763)</b>	<b>(\$360)</b>	<b>(\$360)</b>	<b>(\$360)</b>	<b>(\$360)</b>	<b>(\$1,440)</b>
<b>Net Change in Cash</b>	<b>(\$2,350)</b>	<b>(\$2,886)</b>	<b>\$70</b>	<b>\$198</b>	<b>\$1,198</b>	<b>\$2,925</b>	<b>\$4,391</b>	<b>(\$316)</b>	<b>(\$8)</b>	<b>\$2,390</b>	<b>\$2,466</b>	<b>\$4,533</b>
Beginning Cash Balance	\$13,279	\$10,929	\$8,043	\$8,113	\$8,311	\$9,509	\$8,043	\$12,434	\$12,118	\$12,110	\$14,501	\$12,434
<b>Ending Cash Balance</b>	<b>\$10,929</b>	<b>\$8,043</b>	<b>\$8,113</b>	<b>\$8,311</b>	<b>\$9,509</b>	<b>\$12,434</b>	<b>\$12,434</b>	<b>\$12,118</b>	<b>\$12,110</b>	<b>\$14,501</b>	<b>\$16,967</b>	<b>\$16,967</b>

Source: Company report, Citi Research

## Company Focus

- Company Update
- Initiation of Coverage

<b>Neutral</b>	<b>2</b>
Price (05 Oct 12)	US\$27.29
Target price	US\$30.00
Expected share price return	9.9%
Expected dividend yield	0.0%
<b>Expected total return</b>	<b>9.9%</b>
Market Cap	US\$57,274M

### Price Performance (RIC: EMC.N, BB: EMC US)



## EMC Corp (EMC)

### Secular Drivers Remain Intact But Shares Appear Fairly Valued Given Macro Weakness Could Pressure Storage Spending

- **Stock Call** — We are initiating coverage of EMC Corp (EMC) with a Neutral rating and a target price of \$30. We view the shares to be fairly valued with limited upside to estimates. Our Neutral rating compares with consensus ratings of 95% Buys and 5% Holds. While positive secular trends are likely to drive continued demand for EMC's products and services (storage, virtualization and security), we believe macro factors in Europe and recent signs of weakness in Asia as well as high unemployment rates are likely to limit overall IT and storage spending.
- **What could make us more positive?** — We would become more constructive on the shares if the following catalysts materialize: 1) overall macro environment and unemployment rates improves, particularly in Europe, 2) checks suggest 4Q12 capex budget flush is occurring, 3) EMC is able to drive significant leverage as revenues outgrow operating expenses resulting in more than mid teens EPS growth.
- **What could make us more negative?** — We may become more negative on the shares if the following occurs: 1) further deterioration of the macro environment and IT demand, 2) significantly constrained 4Q12 enterprise IT capex spend, 3) aggressive shifts to storage as a service model and other more storage efficient systems that result in lower storage capacity consumption, 4) more aggressive storage pricing from competitors.
- **Valuation** — Our target price of \$30 is based on 15x F12-month EPS in a year 12 months from now. The shares currently trade at 14.5x Street's F12M EPS estimate, compared to a two-year mean of 15x, a high of 18x and a low of 12x. We note that a peer group of large-cap technology stocks including Microsoft, IBM, H-P, Dell, Intel, Cisco, and Oracle is currently trading in a range of 4x (HPQ) to 13x (IBM) forward twelve month EPS, with a median of 10x. We believe that EMC shares deserve a multiple greater than this range given the favorable growth profile of its end markets and its strong competitive position, offset by the current macro backdrop. Our Neutral stock rating is more conservative than consensus (95% buy, 5% hold, 0% sell).

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
2011A	0.31A	0.35A	0.37A	0.49A	1.52A	1.51A
2012E	0.37A	0.39A	0.42E	0.51E	1.70E	1.72E
Previous	na	na	na	na	na	na
2013E	0.40E	0.44E	0.48E	0.59E	1.91E	1.97E
Previous	na	na	na	na	na	na
2014E	0.45E	0.49E	0.55E	0.72E	2.21E	2.30E
Previous	na	na	na	na	na	na

Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

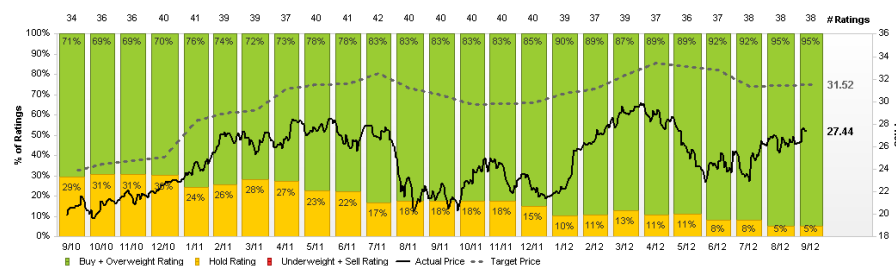
## Recent Results and Outlook

For 2Q12, EMC reported results inline with their preannouncement (a week earlier). Revenues of \$5.31B (+10% YoY, +4% QoQ) were inline with consensus estimates (unchanged prior to the preannouncement). Gross margins expanded to 64.4% (up 210 bps from 2Q11) on mix shift to higher margin products and services. Operating margins were also up by 90 bps to 24%. EPS of \$0.39 was also inline with their preannouncement (consensus estimates were \$0.40 prior to their preannouncement). EMC and VM Ware (80% owned by EMC) also announced several intra company management changes

Management does not provide quarterly updates but reaffirmed their 2012 outlook of \$22Bn in revenues (+10% YoY) and \$1.70 in EPS (+13% YoY). This compares with consensus estimates of \$22Bn and \$1.72 in sales and non GAAP EPS respectively. This is despite macro concerns that continue to pressure overall IT spending (expected to be towards the lower end of the 3-4% range expected at the start of the year). Management's confidence in its growth is predicated on enterprise demand for storage, virtualization and security which is expected to outgrow overall IT spending as well as continued market share gains. Longer term, management expects EMC to grow at 13+% CAGR (2011-2014) with continued improvement in EPS leverage.

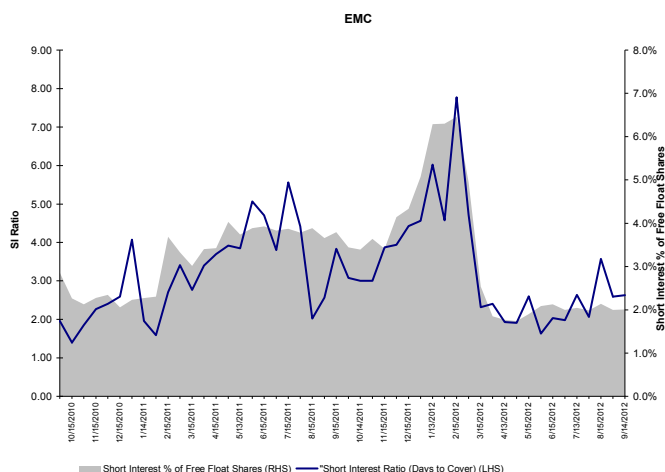
EMC is viewed as a consensus Buy rating with 95% Buy ratings but we believe a more healthy IT spending environment is needed.

Figure 1. EMC Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Figure 2. EMC Short Interest Analysis



Source: FactSet and Citi Research

Figure 3. EMC Income Statement (detailed model available upon request)

Income Statement (EMC)	2010A	2011A	2012E				2012E	2013E				2013E	2014E
Fiscal Year Ends December	FYA	FYA	1QA	2QA	3QE	4QE	FYE	1QE	2QE	3QE	4QE	FYE	FYE
Dollars in Millions													
<b>INFORMATION STORAGE</b>	<b>12,699</b>	<b>14,714</b>	<b>3,689</b>	<b>3,817</b>	<b>3,945</b>	<b>4,317</b>	<b>15,767</b>	<b>3,901</b>	<b>3,979</b>	<b>4,173</b>	<b>4,710</b>	<b>16,762</b>	<b>18,687</b>
% of Information Infrastructure revenue	90%	91%	91%	91%	91%	91%	91%	91%	90%	90%	90%	90%	90%
% of total revenue	75%	74%	72%	72%	72%	72%	72%	71%	69%	70%	70%	70%	69%
% chg yr to yr	19%	16%	8%	7%	8%	6%	7%	6%	4%	6%	9%	6%	11%
% chg qtr to qtr													
<b>INFORMATION INTELLIGENCE GROUP</b>	<b>736</b>	<b>702</b>	<b>146</b>	<b>153</b>	<b>152</b>	<b>177</b>	<b>627</b>	<b>152</b>	<b>186</b>	<b>191</b>	<b>234</b>	<b>763</b>	<b>784</b>
% of Information Infrastructure Revenue	5%	4%	4%	4%	4%	4%	4%	4%	4%	4%	4%	4%	4%
% of total revenue	4%	4%	3%	3%	3%	3%	3%	3%	3%	3%	3%	3%	3%
% chg yr to yr	0%	-5%	-9%	-10%	-11%	-12%	-11%	5%	21%	26%	32%	22%	3%
% chg qtr to qtr													
<b>RSA INFORMATION SECURITY</b>	<b>729</b>	<b>828</b>	<b>207</b>	<b>221</b>	<b>237</b>	<b>266</b>	<b>931</b>	<b>244</b>	<b>255</b>	<b>279</b>	<b>313</b>	<b>1,091</b>	<b>1,212</b>
% of Information Infrastructure Revenue	5%	5%	5%	5%	5%	6%	5%	6%	6%	6%	6%	6%	6%
% of total revenue	4%	4%	4%	4%	4%	4%	4%	4%	4%	5%	5%	5%	4%
% chg yr to yr	20%	14%	19%	13%	10%	10%	12%	18%	16%	18%	18%	17%	11%
% chg qtr to qtr													
<b>VMware Revenue</b>	<b>\$2,851</b>	<b>\$3,763</b>	<b>\$1,053</b>	<b>\$1,121</b>	<b>\$1,113</b>	<b>\$1,251</b>	<b>\$4,538</b>	<b>\$1,212</b>	<b>\$1,313</b>	<b>\$1,360</b>	<b>\$1,504</b>	<b>\$5,389</b>	<b>\$6,266</b>
% of total revenue	17%	19%	21%	21%	20%	21%	21%	22%	23%	23%	22%	22%	23%
<b>Consolidated Revenue</b>	<b>\$17,015</b>	<b>\$20,008</b>	<b>\$5,094</b>	<b>\$5,311</b>	<b>\$5,447</b>	<b>\$6,011</b>	<b>\$21,864</b>	<b>\$5,509</b>	<b>\$5,732</b>	<b>\$6,003</b>	<b>\$6,761</b>	<b>\$24,005</b>	<b>\$26,949</b>
Cost of Goods Sold (non-GAAP)	\$6,744	\$7,491	\$1,887	\$1,893	\$1,960	\$2,094	\$7,834	\$2,001	\$2,003	\$2,081	\$2,307	\$8,391	\$9,356
<b>Gross Profit</b>													
R&D (non-GAAP)	\$1,606	\$1,834	\$518	\$573	\$572	\$571	\$2,234	\$588	\$634	\$634	\$631	\$2,487	\$2,723
SG&A (Non-GAAP)	\$4,928	\$5,898	\$1,505	\$1,570	\$1,630	\$1,797	\$6,503	\$1,672	\$1,739	\$1,799	\$1,988	\$7,197	\$7,970
Operating Expense	\$6,533	\$7,732	\$2,023	\$2,143	\$2,203	\$2,367	\$8,736	\$2,259	\$2,373	\$2,433	\$2,619	\$9,684	\$10,693
<b>Operating Income</b>	<b>\$3,738</b>	<b>\$4,784</b>	<b>\$1,184</b>	<b>\$1,275</b>	<b>\$1,284</b>	<b>\$1,550</b>	<b>\$5,293</b>	<b>\$1,249</b>	<b>\$1,357</b>	<b>\$1,489</b>	<b>\$1,835</b>	<b>\$5,930</b>	<b>\$6,901</b>
Depr and amort													
<b>EBITDA</b>	<b>\$4,906</b>	<b>\$6,206</b>	<b>\$1,552</b>	<b>\$1,651</b>	<b>\$1,610</b>	<b>\$1,875</b>	<b>\$6,687</b>	<b>\$1,574</b>	<b>\$1,682</b>	<b>\$1,814</b>	<b>\$2,161</b>	<b>\$7,232</b>	<b>\$8,202</b>
Other Income (expense), net	(\$74)	(\$245)	(\$31)	(\$35)	(\$41)	(\$42)	(\$149)	(\$27)	(\$23)	(\$21)	(\$24)	(\$95)	(\$63)
Pre-tax Income	\$3,664	\$4,539	\$1,153	\$1,240	\$1,243	\$1,508	\$5,144	\$1,222	\$1,334	\$1,468	\$1,811	\$5,835	\$6,837
Provision for Taxes	\$824	\$950	\$277	\$310	\$251	\$305	\$1,143	\$254	\$277	\$305	\$379	\$1,215	\$1,421
Effective Tax Rate	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Non-GAAP Net Income	\$2,840	\$3,589	\$877	\$930	\$992	\$1,203	\$4,001	\$968	\$1,057	\$1,163	\$1,432	\$4,620	\$5,417
Less: Minority Interest in VMware	(\$125)	(\$208)	(\$59)	(\$63)	(\$55)	(\$64)	(\$241)	(\$61)	(\$70)	(\$75)	(\$83)	(\$289)	(\$352)
<b>Non-GAAP Net Income available to common</b>	<b>\$2,715</b>	<b>\$3,381</b>	<b>\$818</b>	<b>\$867</b>	<b>\$937</b>	<b>\$1,139</b>	<b>\$3,760</b>	<b>\$907</b>	<b>\$987</b>	<b>\$1,088</b>	<b>\$1,349</b>	<b>\$4,330</b>	<b>\$5,064</b>
GAAP Net Income	\$1,970	\$2,610	\$626	\$689	\$749	\$946	\$3,011	\$694	\$786	\$885	\$1,149	\$3,514	\$4,229
Less: Minority Interest in VMware	(\$70)	(\$148)	(\$39)	(\$40)	(\$36)	(\$41)	(\$155)	(\$36)	(\$44)	(\$48)	(\$56)	(\$184)	(\$241)
<b>GAAP Net Income available to common</b>	<b>\$1,900</b>	<b>\$2,462</b>	<b>\$587</b>	<b>\$650</b>	<b>\$714</b>	<b>\$906</b>	<b>\$2,856</b>	<b>\$658</b>	<b>\$742</b>	<b>\$837</b>	<b>\$1,093</b>	<b>\$3,329</b>	<b>\$3,988</b>
Non-GAAP Basic EPS	1.32	1.65	0.40	0.41	0.44	0.54	1.79	0.42	0.46	0.50	0.62	2.01	2.33
<b>Non-GAAP Diluted EPS</b>	<b>1.26</b>	<b>1.52</b>	<b>0.37</b>	<b>0.39</b>	<b>0.42</b>	<b>0.51</b>	<b>1.70</b>	<b>0.40</b>	<b>0.44</b>	<b>0.48</b>	<b>0.59</b>	<b>1.91</b>	<b>2.21</b>
GAAP Basic EPS	0.92	1.20	0.28	0.31	0.34	0.43	1.36	0.31	0.35	0.39	0.50	1.55	1.83
GAAP Diluted EPS	0.88	1.11	0.27	0.29	0.32	0.41	1.29	0.29	0.33	0.37	0.48	1.47	1.74
Non-GAAP F12 EPS	-	-	1.70	1.73	1.77	1.83	28.69	1.91	1.96	2.02	2.09	-	-
GAAP F12 EPS	-	-	1.29	1.31	1.35	1.40	-	1.47	1.52	1.57	1.63	21.12	-
Basic Shares Out	2,056	2,056	2,068	2,096	2,108	2,125	2,099	2,138	2,147	2,156	2,166	2,152	2,177
Diluted Shares Out	2,148	2,229	2,202	2,208	2,220	2,236	2,216	2,249	2,258	2,267	2,277	2,263	2,288
Dividend per Common Share	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
<b>Percent of Revenue (non-GAAP)</b>													
Product	64%	63%	60%	60%	60%	60%	60%	57%	58%	58%	60%	58%	58%
Services	36%	37%	40%	40%	40%	40%	40%	43%	42%	42%	40%	42%	42%
Gross Margin	60%	63%	63%	64%	64%	65%	64%	64%	65%	65%	66%	65%	65%
R&D	9%	9%	10%	11%	11%	9%	10%	11%	11%	11%	9%	10%	10%
SG&A	29%	29%	30%	30%	30%	30%	30%	30%	30%	30%	29%	30%	30%
Total Opex	38%	39%	40%	40%	40%	39%	40%	41%	41%	41%	39%	40%	40%
Operating Margin	22%	24%	23%	24%	24%	26%	24%	23%	24%	25%	27%	25%	26%
Net Income	16%	17%	16%	16%	17%	19%	17%	16%	17%	18%	20%	18%	19%
<b>% Change Year to Year</b>													
Revenue	21%	18%	11%	10%	9%	8%	9%	8%	8%	10%	12%	10%	12%
Revenue, Constant Currency	0%	16%	11%	12%	0%	0%	0%	0%	0%	0%	0%	0%	0%
Cost of Sales	12%	11%	3%	3%	6%	6%	5%	6%	6%	6%	10%	7%	11%
R&D	15%	14%	23%	25%	22%	17%	22%	14%	11%	11%	11%	11%	9%
SG&A	19%	20%	12%	9%	11%	9%	10%	11%	11%	10%	11%	11%	11%
Total Opex	18%	18%	14%	13%	13%	11%	13%	12%	11%	10%	11%	11%	10%
Operating Income	53%	28%	18%	14%	8%	6%	11%	5%	6%	16%	18%	12%	16%
Pretax Income	54%	24%	21%	14%	11%	10%	13%	6%	8%	18%	20%	13%	17%
Net Income	46%	24%	17%	9%	14%	7%	11%	11%	14%	16%	18%	15%	17%
Diluted non-GAAP EPS	40%	20%	20%	12%	13%	4%	12%	9%	11%	14%	16%	13%	16%

Source: Citi Research



Figure 4. EMC Balance Sheet and Cash Flow Statement (Detailed Model Available Upon Request)

Balance Sheet (EMC)	2010A	2011A	2012E				2012E	2013E				2013E	2014E
Fiscal Year Ends December	FYA	FYA	1QA	2QA	3QE	4QE	FYA	1QE	2QE	3QE	4QE	FYA	FYA
Dollars in Millions			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
Cash & Equivalents	\$4,119	\$4,531	\$4,671	\$3,993	\$3,789	\$5,519	\$5,519	\$6,642	\$7,294	\$6,385	\$8,252	\$8,252	\$10,977
Short-Term Investments	\$1,256	\$1,787	\$1,668	\$1,660	\$1,660	\$1,660	\$1,660	\$1,660	\$1,660	\$1,660	\$1,660	\$1,660	\$1,660
Accounts Receivable	\$2,570	\$2,937	\$2,662	\$2,974	\$2,899	\$3,168	\$3,168	\$2,878	\$3,209	\$3,195	\$3,563	\$3,563	\$4,081
Inventories	\$856	\$1,010	\$1,034	\$1,029	\$1,208	\$1,089	\$1,089	\$1,118	\$1,111	\$1,331	\$1,225	\$1,225	\$1,403
Deferred Income Taxes (Current)	\$610	\$733	\$750	\$792	\$711	\$804	\$804	\$795	\$852	\$839	\$965	\$965	\$1,173
Other Current Assets	\$372	\$584	\$515	\$486	\$849	\$617	\$617	\$543	\$517	\$984	\$730	\$730	\$883
<b>Total Current Assets</b>	<b>\$9,783</b>	<b>\$11,583</b>	<b>\$11,300</b>	<b>\$10,935</b>	<b>\$11,116</b>	<b>\$12,856</b>	<b>\$12,856</b>	<b>\$13,637</b>	<b>\$14,644</b>	<b>\$14,394</b>	<b>\$16,395</b>	<b>\$16,395</b>	<b>\$20,178</b>
Property, Plant and Equipment, net	\$2,528	\$2,833	\$2,879	\$2,942	\$2,997	\$3,059	\$3,059	\$3,113	\$3,153	\$3,180	\$3,194	\$3,194	\$3,302
Long Term Investments	\$4,116	\$4,525	\$4,540	\$5,253	\$5,351	\$5,107	\$5,107	\$5,088	\$4,940	\$4,942	\$4,669	\$4,669	\$4,309
Notes Receivable	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Deferred Income Taxes	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Other Assets	\$1,009	\$1,406	\$1,336	\$1,416	\$1,416	\$1,416	\$1,416	\$1,416	\$1,416	\$1,416	\$1,416	\$1,416	\$1,416
Intangibles	\$1,624	\$1,766	\$1,714	\$1,758	\$1,758	\$1,758	\$1,758	\$1,758	\$1,758	\$1,758	\$1,758	\$1,758	\$1,758
Goodwill	\$11,773	\$12,155	\$12,217	\$12,655	\$12,655	\$12,655	\$12,655	\$12,655	\$12,655	\$12,655	\$12,655	\$12,655	\$12,655
<b>Total Assets</b>	<b>\$30,833</b>	<b>\$34,268</b>	<b>\$33,985</b>	<b>\$34,959</b>	<b>\$35,292</b>	<b>\$36,852</b>	<b>\$36,852</b>	<b>\$37,667</b>	<b>\$38,567</b>	<b>\$38,345</b>	<b>\$40,088</b>	<b>\$40,088</b>	<b>\$43,618</b>
Accounts Payable	\$1,063	\$1,102	\$923	\$880	\$920	\$1,001	\$1,001	\$978	\$931	\$977	\$1,002	\$1,002	\$1,047
Accrued Expenses	\$2,090	\$2,355	\$2,246	\$2,321	\$2,675	\$2,620	\$2,620	\$2,509	\$2,569	\$2,553	\$2,505	\$2,505	\$2,511
Notes Payable and Current Portion LTD	\$3,215	\$3,305	\$1,621	\$1,622	\$1,622	\$1,622	\$1,622	\$1,622	\$1,622	\$1,622	\$1,622	\$1,622	\$1,622
Income Taxes Payable	\$200	\$156	\$24	\$188	\$0	\$171	\$171	\$26	\$202	\$0	\$205	\$205	\$249
Deferred Revenues	\$2,811	\$3,459	\$4,073	\$4,183	\$3,637	\$3,730	\$3,730	\$4,405	\$4,515	\$4,008	\$4,195	\$4,195	\$4,806
<b>Total Current Liabilities</b>	<b>\$9,378</b>	<b>\$10,376</b>	<b>\$8,887</b>	<b>\$9,193</b>	<b>\$8,853</b>	<b>\$9,143</b>	<b>\$9,143</b>	<b>\$9,539</b>	<b>\$9,839</b>	<b>\$9,159</b>	<b>\$9,529</b>	<b>\$9,529</b>	<b>\$10,234</b>
Long Term Deferred Revenue	\$1,853	\$2,715	\$2,723	\$2,875	\$2,623	\$2,928	\$2,928	\$2,945	\$3,102	\$2,891	\$3,293	\$3,293	\$3,773
Deferred Income Taxes & Other	\$1,200	\$1,130	\$1,136	\$763	\$950	\$956	\$956	\$920	\$821	\$837	\$861	\$861	\$789
Long Term Debt	\$235	\$119	\$104	\$89	\$89	\$89	\$89	\$89	\$89	\$89	\$89	\$89	\$89
<b>Total Liabilities</b>	<b>\$12,667</b>	<b>\$14,341</b>	<b>\$12,850</b>	<b>\$12,920</b>	<b>\$12,516</b>	<b>\$13,116</b>	<b>\$13,116</b>	<b>\$13,492</b>	<b>\$13,850</b>	<b>\$12,976</b>	<b>\$13,772</b>	<b>\$13,772</b>	<b>\$14,884</b>
<b>Minority Interest in VMware</b>	<b>\$763</b>	<b>\$968</b>	<b>\$1,080</b>	<b>\$1,102</b>	<b>\$1,157</b>	<b>\$1,221</b>	<b>\$1,221</b>	<b>\$1,282</b>	<b>\$1,352</b>	<b>\$1,427</b>	<b>\$1,510</b>	<b>\$1,510</b>	<b>\$1,863</b>
<b>Total Shareholders' Equity</b>	<b>\$17,404</b>	<b>\$18,959</b>	<b>\$20,055</b>	<b>\$20,937</b>	<b>\$21,619</b>	<b>\$22,515</b>	<b>\$22,515</b>	<b>\$22,893</b>	<b>\$23,365</b>	<b>\$23,942</b>	<b>\$24,805</b>	<b>\$24,805</b>	<b>\$26,871</b>
<b>Total Liabilities and Equity</b>	<b>\$30,833</b>	<b>\$34,268</b>	<b>\$33,985</b>	<b>\$34,959</b>	<b>\$35,292</b>	<b>\$36,852</b>	<b>\$36,852</b>	<b>\$37,667</b>	<b>\$38,567</b>	<b>\$38,345</b>	<b>\$40,088</b>	<b>\$40,088</b>	<b>\$43,618</b>
<b>Cash Flow Statement (EMC)</b>	<b>2010A</b>	<b>2011A</b>	<b>2012E</b>	<b>2012E</b>	<b>2012E</b>	<b>2012E</b>	<b>2012E</b>	<b>2013E</b>	<b>2013E</b>	<b>2013E</b>	<b>2013E</b>	<b>2014E</b>	<b>2014E</b>
Fiscal Year Ends December	FYE	FYE	1QA	2QA	3QE	4QE	FYE	1QE	2QE	3QE	4QE	FYE	FYE
Dollars in Millions	Jan-00	Jan-00	Mar-12	Jun-12	Sep-12	Dec-12	Jan-00	Mar-13	Jun-13	Sep-13	Dec-13	Jan-00	Jan-00
<b>Net Income</b>	<b>\$1,900</b>	<b>\$2,461</b>	<b>\$626</b>	<b>\$689</b>	<b>\$714</b>	<b>\$906</b>	<b>\$2,935</b>	<b>\$658</b>	<b>\$742</b>	<b>\$837</b>	<b>\$1,093</b>	<b>\$3,329</b>	<b>\$3,988</b>
Depreciation and Amortization	\$1,168	\$1,422	\$367	\$375	\$325	\$325	\$1,394	\$325	\$325	\$325	\$325	\$1,302	\$1,302
Non-cash restructuring, Inventory Wrt	\$113	\$101	\$4	\$23	\$0	\$0	\$27	\$0	\$0	\$0	\$0	\$0	\$0
Stock-based compensation expense	\$668	\$823	\$201	\$223	\$218	\$240	\$882	\$220	\$229	\$240	\$270	\$960	\$1,078
Deferred Income Taxes, Net	(\$50)	(\$19)	(\$52)	(\$64)	\$0	\$0	(\$117)	\$0	\$0	\$0	\$0	\$0	\$0
Other	(\$354)	(\$484)	(\$96)	(\$72)	\$0	\$0	(\$168)	\$0	\$0	\$0	\$0	\$0	\$0
Minority Interest	\$70	\$148	\$0	\$0	\$36	\$41	\$76	\$36	\$44	\$48	\$56	\$184	\$241
<b>Balance Sheet Items:</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>
Accounts receivable	(\$406)	(\$392)	\$300	(\$324)	\$75	(\$269)	(\$218)	\$289	(\$331)	\$15	(\$368)	(\$395)	(\$519)
Inventories	(\$114)	(\$393)	(\$96)	(\$76)	(\$178)	\$119	(\$232)	(\$29)	\$7	(\$220)	\$106	(\$136)	(\$178)
Other Assets	(\$54)	(\$62)	(\$20)	\$48	(\$444)	\$325	(\$91)	\$65	\$83	(\$480)	\$380	\$48	\$56
Accounts Payable	\$154	\$35	(\$29)	(\$41)	\$40	\$81	\$51	(\$23)	(\$47)	\$46	\$25	\$2	\$45
Accrued Expenses	\$4	\$158	(\$168)	\$10	\$354	(\$55)	\$142	(\$111)	\$60	(\$16)	(\$47)	(\$115)	\$5
Income Taxes Payable	\$456	\$337	\$6	\$208	(\$188)	\$171	\$197	(\$145)	\$176	(\$202)	\$205	\$34	\$44
Deferred Revenue	\$957	\$1,509	\$620	\$260	(\$797)	\$397	\$480	\$692	\$268	(\$718)	\$589	\$830	\$1,090
Other Liabilities	(\$32)	(\$121)	\$25	(\$22)	\$243	\$69	\$315	\$24	(\$29)	\$91	\$107	\$194	\$280
Change in Working Capital	\$965	\$1,071	\$638	\$63	(\$896)	\$838	\$644	\$761	\$188	(\$1,484)	\$997	\$463	\$823
<b>Cash Flows from Operations</b>	<b>\$4,479</b>	<b>\$5,521</b>	<b>\$1,688</b>	<b>\$1,237</b>	<b>\$397</b>	<b>\$2,351</b>	<b>\$5,673</b>	<b>\$2,001</b>	<b>\$1,529</b>	<b>(\$34)</b>	<b>\$2,742</b>	<b>\$6,239</b>	<b>\$7,431</b>
Net Investment in PPE	(\$745)	(\$801)	(\$154)	(\$179)	(\$250)	(\$271)	(\$853)	(\$250)	(\$250)	(\$250)	(\$250)	(\$1,000)	(\$1,100)
Capitalized Software Development Costs	(\$363)	(\$442)	(\$106)	(\$101)	(\$100)	(\$100)	(\$407)	(\$125)	(\$125)	(\$125)	(\$125)	(\$500)	(\$600)
Purchases, Sales and Maturities of Avail for Sale Sec	(\$2,259)	(\$928)	\$128	(\$680)	\$0	\$0	(\$552)	\$0	\$0	\$0	\$0	\$0	\$0
Purchase/ Sale of Other Assets	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Equity Investments	\$86	(\$300)	\$0	\$38	\$0	\$0	\$38	\$0	\$0	\$0	\$0	\$0	\$0
Business Acquisitions, net	(\$3,195)	(\$537)	(\$102)	(\$522)	\$0	\$0	(\$625)	\$0	\$0	\$0	\$0	\$0	\$0
Other	\$0	(\$534)	\$15	(\$122)	\$0	\$0	(\$107)	\$0	\$0	\$0	\$0	\$0	\$0
<b>Cash Flows from Investing</b>	<b>(\$6,476)</b>	<b>(\$3,544)</b>	<b>(\$219)</b>	<b>(\$1,565)</b>	<b>(\$350)</b>	<b>(\$371)</b>	<b>(\$2,505)</b>	<b>(\$375)</b>	<b>(\$375)</b>	<b>(\$375)</b>	<b>(\$375)</b>	<b>(\$1,500)</b>	<b>(\$1,700)</b>
Issuance of Common Stock	\$1,212	\$1,011	\$291	\$153	\$0	\$0	\$444	\$0	\$0	\$0	\$0	\$0	\$0
Purchase of Treasury Stock	(\$1,738)	(\$2,926)	(\$40)	(\$493)	(\$250)	(\$250)	(\$1,033)	(\$500)	(\$500)	(\$500)	(\$500)	(\$2,000)	(\$3,000)
Payments of ST and LT Debt	(\$4)	(\$27)	(\$1,700)	(\$14)	\$0	\$0	(\$1,714)	\$0	\$0	\$0	\$0	\$0	\$0
Proceeds from ST and LT Debt	\$4	\$3	\$3	\$1	\$0	\$0	\$4	\$0	\$0	\$0	\$0	\$0	\$0
Other, net	\$282	\$221	\$106	\$24	\$0	\$0	\$131	\$0	\$0	\$0	\$0	\$0	\$0
<b>Cash Flows from Financing</b>	<b>(\$244)</b>	<b>(\$1,718)</b>	<b>(\$1,340)</b>	<b>(\$329)</b>	<b>(\$250)</b>	<b>(\$250)</b>	<b>(\$2,169)</b>	<b>(\$500)</b>	<b>(\$500)</b>	<b>(\$500)</b>	<b>(\$500)</b>	<b>(\$2,000)</b>	<b>(\$3,000)</b>
Effect of FX Rate Changes on Cash	(\$12)	\$5	\$11	(\$21)	(\$1)	\$0	(\$11)	(\$3)	(\$2)	(\$1)	\$0	(\$6)	(\$6)
<b>Net Change in Cash</b>	<b>(\$2,253)</b>	<b>\$264</b>	<b>\$140</b>	<b>(\$678)</b>	<b>(\$204)</b>	<b>\$1,730</b>	<b>\$988</b>	<b>\$1,123</b>	<b>\$652</b>	<b>(\$910)</b>	<b>\$1,867</b>	<b>\$2,733</b>	<b>\$2,725</b>

Source: Citi Research

## Company Focus

- Company Update
- Initiation of Coverage

<b>Neutral</b>	<b>2</b>
Price (05 Oct 12)	US\$30.59
Target price	US\$34.00
Expected share price return	11.1%
Expected dividend yield	0.0%
<b>Expected total return</b>	<b>11.1%</b>
Market Cap	US\$11,114M

### Price Performance (RIC: NTAP.O, BB: NTAP US)



## NetApp Inc (NTAP)

### Macro Weakness Will Pressure Storage Spending and Limit Margin Expansion Potential

■ **Stock Call** — We are initiating coverage of NetApp Inc (NTAP) with a Neutral rating and a target price of \$34. We view the shares to be fairly valued with balanced risk/reward. Our Neutral rating compares with consensus rating distribution of 39% Buy, 58% Hold and 3% Sell. While positive secular trends are likely to drive continued demand for NTAP's storage products and services, we believe macro factors in Europe and recent signs of weakness in Asia as well as high unemployment rates are likely to limit overall IT and storage spending.

■ **What could make us more positive?** — We would become more constructive on the shares if the following catalysts materialize: 1) overall macro environment and unemployment rates improves, particularly in Europe, 2) checks suggest 4Q12 capex budget flush is occurring, 3) NTAP is able to drive sustained product traction from introduction of new products and is able to generate significant leverage from operating expense controls.

■ **What could make us more negative?** — We may become more negative on the shares if the following occurs: 1) further deterioration of the macro environment and IT demand, 2) significantly constrained 4Q12 enterprise IT capex spend, 3) aggressive shifts to storage as a service model and other more storage efficient systems that result in lower storage capacity consumption, 4) more aggressive storage pricing from competitors, 5) aggressive acquisitions that pose integration challenges and have a poor return profile.

■ **Valuation** — Our target price of \$34 is based on 14x F12-month EPS 12 months from now (we are giving NTAP a 5% discount to the 15x target multiple we give to EMC given NTAP's lower growth profile). The shares currently trade at 13.5x consensus forward twelve month earnings estimate, below their 5 year median of 18.8x, a high of 29.3x and a low of 10.3x. We would note that for much of the trailing two years, NetApp has been in the "penalty box" given poor execution beginning in the latter part of C2011. While the storage end market offers a favorable growth profile and NTAP is one of the leading vendors in this space, we don't expect the shares to trade back to their median range in the near to mid term given the macro backdrop and the lower margin profile of the company relative to their prior years. Our Neutral rating on the stock is inline with consensus (39% buy, 58% hold, 3% sell).

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
2012A	0.55A	0.63A	0.58A	0.66A	2.41A	2.41A
2013E	0.42A	0.47E	0.54E	0.62E	2.05E	2.11E
Previous	na	na	na	na	na	na
2014E	0.52E	0.58E	0.59E	0.65E	2.34E	2.48E
Previous	na	na	na	na	na	na
2015E	0.62E	0.63E	0.68E	0.73E	2.66E	2.82E
Previous	na	na	na	na	na	na

Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

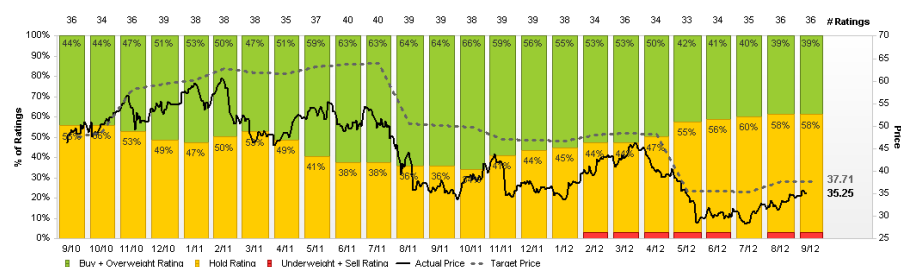


## Recent Results and Outlook

For 1Q13 (July 2012) NetApp reported revenues of \$1.45B (-1% YoY, -15% q/q), at the mid point of their prior guide of \$1.4 - \$1.5B vs. consensus of \$1.46B. Product revenues (62% of total revenues) saw 7% yoy declines to \$898M, below street expectations of \$933 M, while software and services revenues up sided expectations to drive overall revenue performance in line with expectations. Gross margins of 60.3% were within management's guidance of 60-61% vs expectations of 60.4%. Operating margins of 12.5% came in above guidance of 11-12% amidst tighter operating expense controls, resulting in overall non GAAP EPS of \$0.42 above consensus expectations of \$0.38.

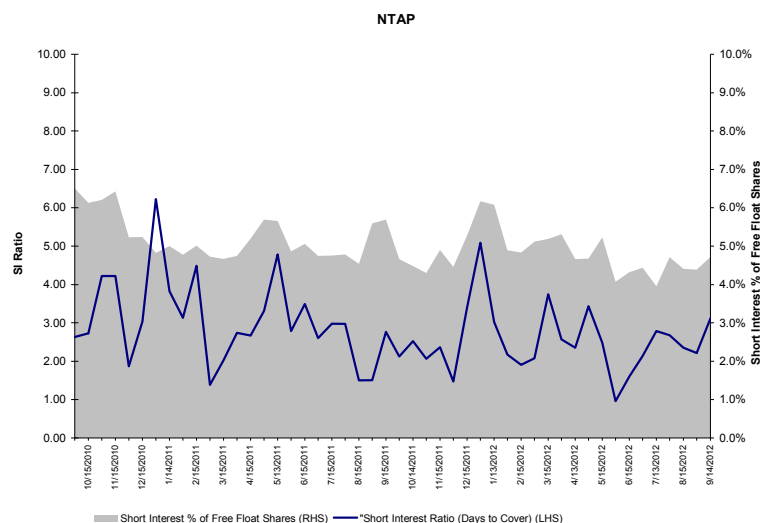
Management guided for 2Q13 revenues of \$1.5-\$1.6B and EPS of \$0.45-\$0.50, inline with consensus expectations of \$1.54 and \$0.46. At the midpoint, NTAP's guide implies revenue growth of 3% y/y and sequential growth of 7%. Gross margins are expected to be within the 60-61% range with non GAAP operating margins expected to expand to 13-14% as operating expenses are tightly managed. Longer term through FY 2015, management's expectations are for sales to grow at 2x the market growth rates while gross margins to remain in the 60-62% range and operating margins to hover around 17-19%.

Figure 1. NTAP Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Figure 2. NTAP Short Interest Analysis



Source: FactSet and Citi Research

Figure 3. NTAP Income Statement (Detailed model available upon request)

Income Statement (NTAP)	2011	2012	2013				2013	2014				2014	2015
Fiscal Year Ends April	FYA	FYA	1QA	2QE	3QE	4QE	FYE	1QE	2QE	3QE	4QE	FYE	FYE
Dollars in Millions			Jul-12	Oct-12	Jan-13	Apr-13		Jul-13	Oct-13	Jan-14	Apr-14		
Revenue - Product	3,280	4,210	898	964	1,036	1,152	4,050	977	1,026	1,100	1,194	4,296	4,795
Revenue - Software Entitlements	723	812	219	223	227	232	901	237	237	241	244	958	1,017
Revenue - Services	1,038	1,211	328	332	339	361	1,360	360	364	371	388	1,484	1,605
<b>Revenue</b>	<b>5,042</b>	<b>6,233</b>	<b>1,445</b>	<b>1,519</b>	<b>1,602</b>	<b>1,745</b>	<b>6,311</b>	<b>1,574</b>	<b>1,626</b>	<b>1,712</b>	<b>1,825</b>	<b>6,738</b>	<b>7,417</b>
Cost of Sales- Product	1,295	1,913	436	469	497	542	1,944	467	494	531	568	2,061	2,289
Cost of Sales - Software Entitlements	16	24	7	7	7	7	27	7	7	7	7	29	31
Cost of Sales - Service	422	498	130	132	135	145	543	143	144	147	155	589	622
Cost of Sales	1,733	2,435	573	608	639	694	2,514	617	646	685	731	2,679	2,942
Gross Profit	3,309	3,798	872	911	963	1,051	3,796	957	981	1,027	1,095	4,059	4,475
R&D	604	751	198	201	200	218	817	205	203	214	219	841	907
Sales & Marketing	1,511	1,705	437	441	457	489	1,822	456	455	479	511	1,902	2,077
General & Administrative	220	231	57	61	64	70	251	63	65	68	73	270	297
Non-GAAP Operating Expense	2,335	2,687	691	703	721	776	2,891	724	724	762	803	3,013	3,281
<b>Operating Income</b>	<b>974</b>	<b>1,111</b>	<b>181</b>	<b>209</b>	<b>242</b>	<b>274</b>	<b>906</b>	<b>233</b>	<b>257</b>	<b>265</b>	<b>292</b>	<b>1,046</b>	<b>1,194</b>
Depr and amort	166	293	82	85	88	91	348	94	97	100	103	396	444
EBITDA	1,139	1,404	263	294	330	366	1,253	327	354	365	395	1,442	1,638
Interest Income	40	38	11	10	10	10	40	10	10	10	10	39	39
Interest Expense	23	22	6	6	6	6	22	6	6	6	6	22	22
Other Income (Expense)	2	1	3	0	0	0	3	0	0	0	0	0	0
Pretax Income	993	1,128	189	213	246	278	927	237	261	269	296	1,063	1,211
Provision for Income Taxes	160	202	33	38	44	50	165	43	47	48	53	191	218
Effective Tax Rate	16%	18%	17%	18%	18%	18%	18%	18%	18%	18%	18%	18%	18%
<b>Non-GAAP Net Income</b>	<b>833</b>	<b>926</b>	<b>156</b>	<b>175</b>	<b>202</b>	<b>228</b>	<b>761</b>	<b>194</b>	<b>214</b>	<b>221</b>	<b>242</b>	<b>872</b>	<b>993</b>
GAAP Net Income	640	605	64	80	120	146	409	112	132	138	160	542	663
Non-GAAP Basic EPS	\$ 2.30	\$ 2.55	\$ 0.43	\$ 0.48	\$ 0.55	\$ 0.62	\$ 2.08	\$ 0.53	\$ 0.58	\$ 0.60	\$ 0.66	\$ 2.38	\$ 2.70
<b>Non-GAAP Diluted EPS</b>	<b>\$ 2.11</b>	<b>\$ 2.41</b>	<b>\$ 0.42</b>	<b>\$ 0.47</b>	<b>\$ 0.54</b>	<b>\$ 0.62</b>	<b>\$ 2.05</b>	<b>\$ 0.52</b>	<b>\$ 0.58</b>	<b>\$ 0.59</b>	<b>\$ 0.65</b>	<b>\$ 2.34</b>	<b>\$ 2.66</b>
GAAP Basic EPS	\$ 1.77	\$ 1.66	\$ 0.17	\$ 0.22	\$ 0.33	\$ 0.40	\$ 1.12	\$ 0.31	\$ 0.36	\$ 0.38	\$ 0.44	\$ 1.48	\$ 1.80
GAAP Diluted EPS	\$ 1.62	\$ 1.58	\$ 0.17	\$ 0.22	\$ 0.32	\$ 0.39	\$ 1.10	\$ 0.30	\$ 0.35	\$ 0.37	\$ 0.43	\$ 1.46	\$ 1.78
Basic Shares Outstanding	361	364	366	366	366	366	366	366	367	367	367	367	368
Diluted Shares Outstanding	394	384	371	371	371	371	371	372	372	372	372	372	373
<b>Percent of Revenue</b>													
<b>Gross Margin</b>	<b>66%</b>	<b>61%</b>	<b>60%</b>	<b>60%</b>	<b>60%</b>	<b>60%</b>	<b>60%</b>	<b>61%</b>	<b>60%</b>	<b>60%</b>	<b>60%</b>	<b>60%</b>	<b>60%</b>
Non-GAAP R&D	12%	12%	14%	13%	13%	13%	13%	13%	13%	13%	12%	12%	12%
Non-GAAP Marketing and Selling	30%	27%	30%	29%	29%	28%	29%	29%	28%	28%	28%	28%	28%
Non-GAAP G&A	4%	4%	4%	4%	4%	4%	4%	4%	4%	4%	4%	4%	4%
Non-GAAP Operating Expense	46%	43%	48%	46%	45%	45%	46%	46%	45%	45%	44%	45%	44%
<b>Non-GAAP Operating Income</b>	<b>19%</b>	<b>18%</b>	<b>13%</b>	<b>14%</b>	<b>15%</b>	<b>16%</b>	<b>14%</b>	<b>15%</b>	<b>16%</b>	<b>15%</b>	<b>16%</b>	<b>16%</b>	<b>16%</b>
Non-GAAP Net Income	17%	15%	11%	11%	13%	13%	12%	12%	13%	13%	13%	13%	13%
<b>% Change Year to Year</b>													
<b>Total Revenue</b>	<b>28%</b>	<b>24%</b>	<b>-1%</b>	<b>1%</b>	<b>2%</b>	<b>2%</b>	<b>1%</b>	<b>9%</b>	<b>7%</b>	<b>7%</b>	<b>5%</b>	<b>7%</b>	<b>10%</b>
<b>Revenue, Constant Currency</b>	<b>0%</b>	<b>0%</b>	<b>-1%</b>	<b>0%</b>	<b>0%</b>	<b>0%</b>	<b>0%</b>	<b>0%</b>	<b>0%</b>	<b>0%</b>	<b>0%</b>	<b>0%</b>	<b>0%</b>
<b>Cost of Sales</b>	<b>26%</b>	<b>41%</b>	<b>7%</b>	<b>6%</b>	<b>1%</b>	<b>1%</b>	<b>3%</b>	<b>8%</b>	<b>6%</b>	<b>7%</b>	<b>5%</b>	<b>7%</b>	<b>10%</b>
Non-GAAP R&D	21%	24%	10%	11%	8%	7%	9%	3%	1%	7%	0%	3%	8%
Non-GAAP Marketing and Selling	24%	13%	5%	6%	6%	11%	7%	5%	3%	5%	5%	4%	9%
Non-GAAP G&A	5%	5%	0%	8%	18%	10%	9%	11%	7%	7%	5%	7%	10%
Non-GAAP Operating Expense	21%	15%	6%	7%	7%	9%	8%	5%	3%	6%	3%	4%	9%
<b>Non-GAAP Operating Income</b>	<b>54%</b>	<b>14%</b>	<b>-33%</b>	<b>-25%</b>	<b>-6%</b>	<b>-10%</b>	<b>-18%</b>	<b>29%</b>	<b>23%</b>	<b>9%</b>	<b>6%</b>	<b>16%</b>	<b>14%</b>
Non-GAAP Net Income	56%	11%	-30%	-26%	-6%	-10%	-18%	24%	23%	9%	6%	14%	14%
<b>Non-GAAP Diluted EPS</b>	<b>40%</b>	<b>14%</b>	<b>-23%</b>	<b>-25%</b>	<b>-6%</b>	<b>-7%</b>	<b>-15%</b>	<b>24%</b>	<b>22%</b>	<b>9%</b>	<b>6%</b>	<b>14%</b>	<b>14%</b>

Source: Citi Research

Figure 4. NTAP Balance Sheet and Cash Flow Statement (Detailed model available upon request)

Balance Sheet (NTAP) Fiscal Year Ends April Dollars in Millions	2011 FY	2012 FY	2013				2013 FY	2014				2014 FY	2015 FY
			1QA July-12	2QE October-12	3QE January-13	4QE April-13		1QE July-13	2QE October-13	3QE January-14	4QE April-14		
Cash & Equivalents	2,757	1,550	1,529	1,356	1,327	1,280	1,280	1,222	1,380	1,303	1,272	1,272	1,264
Short-Term Investments	2,418	3,849	3,912	3,912	3,912	3,912	3,912	3,912	3,912	3,912	3,912	3,912	3,912
Accounts Receivable	743	831	584	630	701	852	852	666	675	750	891	891	1,001
Inventory	109	162	204	197	188	198	198	232	211	201	207	207	233
Prepaid Expenses & Other Current Assets	369	436	512	430	496	477	477	536	443	525	493	493	554
Deferred Income Tax	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>Total Current Assets</b>	<b>6,394</b>	<b>6,827</b>	<b>6,741</b>	<b>6,525</b>	<b>6,625</b>	<b>6,718</b>	<b>6,718</b>	<b>6,568</b>	<b>6,620</b>	<b>6,691</b>	<b>6,775</b>	<b>6,775</b>	<b>6,963</b>
Property, Plant & Equipment, net	912	1,137	1,139	1,121	1,104	1,090	1,090	1,062	1,037	1,013	992	992	866
Goodwill	760	905	905	905	905	905	905	905	905	905	905	905	905
Intangible Assets	53	236	215	215	215	215	215	215	215	215	215	215	215
Long-Term Investments	69	60	60	60	60	60	60	60	60	60	60	60	60
Other Long-Term Assets	310	367	346	404	367	386	386	364	424	385	405	405	425
<b>Total Assets</b>	<b>8,499</b>	<b>9,532</b>	<b>9,406</b>	<b>9,229</b>	<b>9,276</b>	<b>9,373</b>	<b>9,373</b>	<b>9,173</b>	<b>9,261</b>	<b>9,269</b>	<b>9,351</b>	<b>9,351</b>	<b>9,434</b>
Accounts Payable	233	233	276	288	218	230	230	295	303	233	241	241	274
Taxes Payable	0	0	0	0	0	0	0	0	0	0	0	0	0
Accrued Comp	763	718	564	451	589	646	646	444	555	644	686	686	673
Short-term Debt	1,150	1,202	1,216	1,216	1,216	1,216	1,216	1,216	1,216	1,216	1,216	1,216	1,216
Short-term Deferred Revenue	1,227	1,367	1,404	1,339	1,302	1,276	1,276	1,331	1,283	1,244	1,214	1,214	1,159
Other Current Liabilities	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>Total Current Liabilities</b>	<b>3,373</b>	<b>3,520</b>	<b>3,460</b>	<b>3,293</b>	<b>3,324</b>	<b>3,368</b>	<b>3,368</b>	<b>3,286</b>	<b>3,358</b>	<b>3,336</b>	<b>3,358</b>	<b>3,358</b>	<b>3,322</b>
Long-Term Debt & Other	193	270	207	207	207	207	207	207	207	207	207	207	207
Long-Term Deferred Revenue	1,088	1,449	1,363	1,394	1,411	1,439	1,439	1,331	1,336	1,347	1,369	1,369	1,307
<b>Total Liabilities</b>	<b>4,654</b>	<b>5,239</b>	<b>5,030</b>	<b>4,895</b>	<b>4,942</b>	<b>5,015</b>	<b>5,015</b>	<b>4,824</b>	<b>4,901</b>	<b>4,891</b>	<b>4,934</b>	<b>4,934</b>	<b>4,837</b>
<b>Stockholders' Equity</b>	<b>3,845</b>	<b>4,294</b>	<b>4,376</b>	<b>4,335</b>	<b>4,333</b>	<b>4,358</b>	<b>4,358</b>	<b>4,349</b>	<b>4,360</b>	<b>4,378</b>	<b>4,417</b>	<b>4,417</b>	<b>4,597</b>
<b>Total Liabilities &amp; Equity</b>	<b>8,499</b>	<b>9,532</b>	<b>9,406</b>	<b>9,229</b>	<b>9,276</b>	<b>9,373</b>	<b>9,373</b>	<b>9,173</b>	<b>9,261</b>	<b>9,269</b>	<b>9,351</b>	<b>9,351</b>	<b>9,434</b>
<b>Cashflow Statement (NTAP)</b>													
Fiscal Year Ends April Dollars in Millions	2011 FYA	2012 FYA	2013				2013 FYE	2014				2014 FYE	2015 FYE
			1QA Jul-12	2QE Oct-12	3QE Jan-13	4QE Apr-13		1QE Jul-13	2QE Oct-13	3QE Jan-14	4QE Apr-14		
Net Income (Loss)	640	605	64	80	120	146	409	112	132	138	160	542	663
Depreciation	166	293	82	85	88	91	348	94	97	100	103	396	444
Amortization of Intangibles	0	0	0	0	0	0	0	0	0	0	0	0	0
Employee Non-Cash Comp	175	258	79	79	79	79	317	79	79	79	79	317	317
Deferred Taxes	0	0	0	0	0	0	0	0	0	0	0	0	0
Other	55	(24)	(23)	(58)	37	(19)	(63)	22	(61)	39	(20)	(19)	(20)
Accounts Receivable	(253)	(90)	244	(46)	(71)	(150)	(23)	186	(9)	(75)	(141)	(39)	(110)
Inventory	1	(17)	(42)	6	9	(10)	(36)	(34)	21	10	(6)	(9)	(26)
Prepaid & Other	0	0	0	82	(67)	20	35	(60)	94	(82)	32	(16)	(61)
Accounts Payable	39	11	42	12	(70)	12	(4)	65	8	(71)	8	11	33
Taxes Payable	0	0	0	0	0	0	0	0	0	0	0	0	0
Accrued Comp	113	(48)	(147)	(114)	138	57	(65)	(201)	111	89	42	41	(13)
Other	(25)	(32)	(23)	0	0	0	(23)	0	0	0	0	0	0
Deferred Revenue	454	506	(47)	(34)	(20)	3	(99)	(54)	(42)	(28)	(7)	(132)	(177)
Changes in Working Capital	329	331	27	(93)	(81)	(68)	(215)	(99)	183	(157)	(72)	(145)	(294)
<b>Cash Flows from Operations</b>	<b>1,364</b>	<b>1,463</b>	<b>229</b>	<b>93</b>	<b>243</b>	<b>229</b>	<b>795</b>	<b>209</b>	<b>430</b>	<b>200</b>	<b>251</b>	<b>1,090</b>	<b>1,109</b>
Capital Expenditures	(223)	(407)	(62)	(67)	(72)	(77)	(278)	(67)	(72)	(77)	(82)	(298)	(318)
Net Change in Investments	(419)	(1,425)	(66)	(0)	(0)	(0)	(66)	(0)	(0)	(0)	(0)	(0)	(0)
Acquisitions, Net of Cash	(137)	(480)	0	0	0	0	0	0	0	0	0	0	0
Other	0	2	1	0	0	0	1	0	0	0	0	0	0
<b>Cash Flows from Investing</b>	<b>(777)</b>	<b>(2,310)</b>	<b>(127)</b>	<b>(67)</b>	<b>(72)</b>	<b>(77)</b>	<b>(342)</b>	<b>(67)</b>	<b>(72)</b>	<b>(77)</b>	<b>(82)</b>	<b>(298)</b>	<b>(318)</b>
Proceed From Stock Sale	357	171	35	0	0	0	35	0	0	0	0	0	0
Repurchase of Common Stock	0	(600)	(150)	(200)	(200)	(200)	(750)	(200)	(200)	(200)	(200)	(800)	(800)
Stock, Net	357	(429)	(115)	(200)	(200)	(200)	(715)	(200)	(200)	(200)	(200)	(800)	(800)
Increase in Debt (Decrease)	(2)	0	0	0	0	0	0	0	0	0	0	0	0
Other	78	86	3	0	0	0	3	0	0	0	0	0	0
<b>Cash Flows from Financing</b>	<b>433</b>	<b>(344)</b>	<b>(112)</b>	<b>(200)</b>	<b>(200)</b>	<b>(200)</b>	<b>(712)</b>	<b>(200)</b>	<b>(200)</b>	<b>(200)</b>	<b>(200)</b>	<b>(800)</b>	<b>(800)</b>
Effect of FX Changes on Cash	32	(16)	(11)	0	0	0	(11)	0	0	0	0	0	0
<b>Net Change in Cash</b>	<b>1,052</b>	<b>(1,208)</b>	<b>(20)</b>	<b>(173)</b>	<b>(29)</b>	<b>(47)</b>	<b>(270)</b>	<b>(58)</b>	<b>158</b>	<b>(77)</b>	<b>(31)</b>	<b>(8)</b>	<b>(8)</b>

Source: Citi Research

## Company Focus

- Company Update
- Initiation of Coverage

<b>Neutral</b>	<b>2</b>
Price (05 Oct 12)	US\$15.36
Target price	US\$17.00
Expected share price return	10.7%
Expected dividend yield	0.0%
<b>Expected total return</b>	<b>10.7%</b>
Market Cap	US\$2,305M

### Price Performance (RIC: IM.N, BB: IM US)



## Ingram Micro Inc (IM)

### Low Valuation Due to Self Inflicted Operational Issues Is Warranted

- **Stock Call** — We are initiating on IM with a Neutral rating and a target of \$17. We view the shares to be fairly valued given that risk/reward seems relatively balanced. The positives we see are 1) shares are trading below book value, 2) ERP roll-out issues have been contained near-term, 3) accretion from pending Brightpoint acquisition could be significant, and not reflected in street estimates (we believe the integration could be \$0.18/0.35 EPS accretive in CY2013/2014), 4) potential upside from high-margin logistics business. However, this is largely offset by the following negatives, which include 1) lingering macro concerns in Europe, which could result in an unexpected drop in revenues and earnings, 2) potential integration hiccups during the integration of Brightpoint, and 3) Asia, which accounts for 22% of revenues, has recently witnessed unsettling signs of softening demand.
- **What could make us more positive?** — We would become more constructive on the shares if the following catalysts materialize: 1) overall macro environment improves, particularly in Europe, 2) signs that the company is regaining meaningful share in Australia following the ERP hiccup, 3) we see enough evidence that the pending integration of Brightpoint does not pose a meaningful operational risk, 3) shares retreat more than 40% below tangible book (\$22 is current tangible book value), which is generally where the shares have troughed in the past.
- **What could make us more negative?** — We would become more negative on the shares if the following occurs: 1) Integration issue with the pending acquisition of Brightpoint, 2) further deterioration of the macro environment and IT demand, 3) additional issues related to future ERP roll-outs which need to resume at some point, 4) further price aggression by competition, especially in Asia-Pacific where IM is trying to regain share, 5) the industry shift to cloud computing begins to meaningfully disintermediate the distribution channel.
- **Valuation** — Our target price of \$17 is based on 8-9x F12-month EPS 12 months from now, which is the 3-year average PE multiple for the IT Distributors (IM, TECD, SNX). We are also modestly below consensus estimates given a more cautious assumption for FY13 growth (+2% yoy growth vs consensus +3% growth) given a challenging IT demand environment, and potential execution issues, with BYOD and other non PCs items (tablets) gaining traction. Our view on the stock is generally inline with consensus (17% Buy, 75% hold, 8% sell ratings). Tangible book value is \$22.

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
<b>2011A</b>	0.34A	0.37A	0.33A	0.70A	1.73A	1.69A
<b>2012E</b>	<b>0.43A</b>	<b>0.39A</b>	<b>0.38E</b>	<b>0.60E</b>	<b>1.79E</b>	<b>1.83E</b>
Previous	na	na	na	na	na	na
<b>2013E</b>	<b>0.42E</b>	<b>0.42E</b>	<b>0.43E</b>	<b>0.65E</b>	<b>1.92E</b>	<b>2.02E</b>
Previous	na	na	na	na	na	na
<b>2014E</b>	<b>0.48E</b>	<b>0.49E</b>	<b>0.50E</b>	<b>0.67E</b>	<b>2.13E</b>	<b>2.26E</b>
Previous	na	na	na	na	na	na

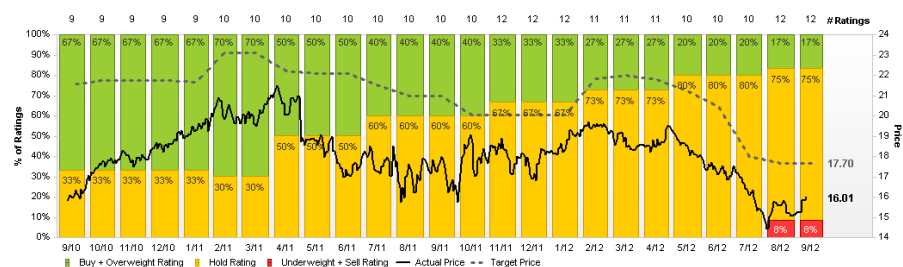
Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

## Recent Results and Outlook

IM's 2Q12 revenues of \$8.78B (flat yoy, +2% qoq) were modestly above consensus estimate of \$8.64B. North America revenues were up +6% qoq (+2% yoy) roughly in line with seasonality, while Europe performed better than expected with revenues declining only 7% qoq, versus the normal double digit decline. While the revenues were above expectations, gross margins declined 25bps sequentially due to aggressively pricing, as well as a higher mix of low-margin volume into the e-tail/retail space. While Asia-Pac regional continues to grow, the modest +4% yoy growth has been limited due to Australia, which continues to struggle following ERP issues in 1CQ11. Management noted that Asia grew 16% in local currency (ex-Australia), with China and India growing over 20% yoy. Reported EPS of \$0.39 were slightly above consensus of \$0.38.

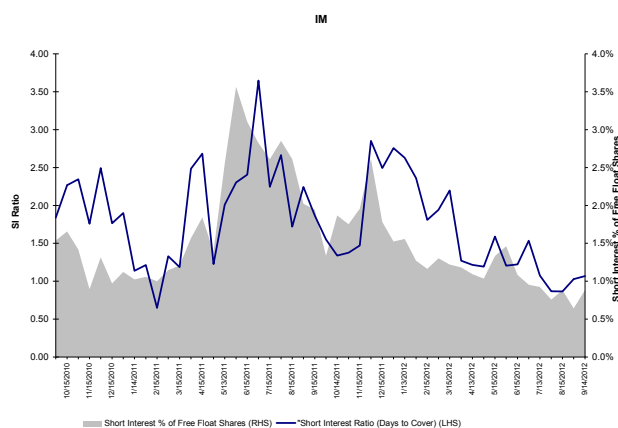
The company guided flattish sequential revenues (vs seasonal low-to-mid single digit qoq growth) for 3CQ, citing macro concerns. The implied revenue of \$8.78B is meaningfully below consensus estimate for \$8.94B. Management also expects gross margins to be under pressure due to pricing and mix, which implies little if any sequential improvement in gross margins in the Sep qtr. Lastly, the company expects the bridge financing loan—which will be used for the pending acquisition of Brightpoint—to result in a \$2M incremental interest expense during 3CQ, which suggests that earnings could be down sequentially. The company did not provide an EPS outlook.

Figure 1. IM Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Figure 2. IM Short Interest Analysis



Source: FactSet and Citi Research

Figure 3. IM Income Statement (detailed model available upon request)

Income Statement (IM)													
Fiscal Year Ends December													
Dollars in Millions													
	FY10	FY11	Q1	Q2	Q3E	Q4E	FY12E	Q1E	Q2E	Q3E	Q4E	FY13E	FY14E
			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
<b>North America</b>	<b>\$14,549</b>	<b>\$15,251</b>	<b>\$3,607</b>	<b>\$3,837</b>	<b>\$3,837</b>	<b>\$4,259</b>	<b>\$15,541</b>	<b>\$3,706</b>	<b>\$3,901</b>	<b>\$3,940</b>	<b>\$4,324</b>	<b>\$15,870</b>	<b>\$16,236</b>
% chg yr to yr	18%	5%	3%	2%	2%	1%	2%	3%	2%	3%	2%	2%	2%
% chg qtr to qtr	-	-	-14%	6%	0%	11%	-	-13%	5%	1%	10%	-	-
<b>Europe</b>	<b>\$10,871</b>	<b>\$11,371</b>	<b>\$2,647</b>	<b>\$2,460</b>	<b>\$2,571</b>	<b>\$3,343</b>	<b>\$11,021</b>	<b>\$2,808</b>	<b>\$2,527</b>	<b>\$2,527</b>	<b>\$3,285</b>	<b>\$11,147</b>	<b>\$11,111</b>
% chg yr to yr	15%	5%	-8%	-7%	-3%	4%	-3%	6%	3%	-2%	-2%	1%	0%
% chg qtr to qtr	-	-	-17%	-7%	5%	30%	-	-16%	-10%	0%	30%	-	-
<b>Asia Pacific</b>	<b>\$7,570</b>	<b>\$7,921</b>	<b>\$1,950</b>	<b>\$2,038</b>	<b>\$2,038</b>	<b>\$2,135</b>	<b>\$8,161</b>	<b>\$2,038</b>	<b>\$2,087</b>	<b>\$2,139</b>	<b>\$2,234</b>	<b>\$8,497</b>	<b>\$9,002</b>
% chg yr to yr	21%	5%	1%	4%	-1%	9%	3%	5%	2%	5%	5%	4%	6%
% chg qtr to qtr	-	-	-1%	5%	0%	5%	-	-5%	2%	3%	4%	-	-
<b>Latin America</b>	<b>\$1,598</b>	<b>\$1,786</b>	<b>\$432</b>	<b>\$442</b>	<b>\$442</b>	<b>\$531</b>	<b>\$1,847</b>	<b>\$425</b>	<b>\$403</b>	<b>\$444</b>	<b>\$599</b>	<b>\$1,871</b>	<b>\$1,909</b>
% chg yr to yr	9%	12%	6%	14%	5%	-7%	3%	-2%	-9%	0%	13%	1%	2%
% chg qtr to qtr	-	-	-25%	2%	0%	20%	-	-20%	-5%	10%	35%	-	-
<b>Revenue</b>	<b>\$34,589</b>	<b>\$36,329</b>	<b>\$8,635</b>	<b>\$8,778</b>	<b>\$8,889</b>	<b>\$10,268</b>	<b>\$36,570</b>	<b>\$8,976</b>	<b>\$8,918</b>	<b>\$9,049</b>	<b>\$10,442</b>	<b>\$37,385</b>	<b>\$38,257</b>
% chg qtr to qtr	-	-	-13.2%	1.7%	1.3%	15.5%	-	-12.6%	-0.7%	1.5%	15.4%	-	-
Cost of Sales	\$32,706	\$34,420	\$8,168	\$8,325	\$8,420	\$9,706	\$34,619	\$8,507	\$8,452	\$8,567	\$9,865	\$35,392	\$36,198
<b>Gross Profit</b>	<b>\$1,883</b>	<b>\$1,908</b>	<b>\$468</b>	<b>\$453</b>	<b>\$469</b>	<b>\$562</b>	<b>\$1,951</b>	<b>\$469</b>	<b>\$466</b>	<b>\$482</b>	<b>\$577</b>	<b>\$1,994</b>	<b>\$2,059</b>
SG&A	\$1,379	\$1,415	\$354	\$350	\$364	\$409	\$1,477	\$355	\$352	\$365	\$413	\$1,485	\$1,506
Options Expense	\$27	\$31	\$9	\$5	\$6	\$6	\$27	\$7	\$7	\$7	\$7	\$28	\$32
<b>Operating Income</b>	<b>\$477</b>	<b>\$463</b>	<b>\$105</b>	<b>\$98</b>	<b>\$98</b>	<b>\$147</b>	<b>\$448</b>	<b>\$107</b>	<b>\$107</b>	<b>\$110</b>	<b>\$157</b>	<b>\$480</b>	<b>\$521</b>
Depreciation and Amortization	\$62	\$57	\$14	\$14	\$14	\$15	\$57	\$15	\$16	\$16	\$17	\$64	\$72
EBITDA	\$538	\$520	\$119	\$112	\$113	\$162	\$505	\$122	\$123	\$126	\$174	\$545	\$593
Interest Income	(\$5)	(\$6)	(\$4)	(\$2)	(\$2)	(\$3)	(\$11)	(\$3)	(\$2)	(\$3)	(\$3)	(\$10)	(\$12)
Interest & Other Expense (Income)	\$39	\$53	\$12	\$12	\$15	\$15	\$53	\$15	\$15	\$15	\$15	\$60	\$60
Interest Expense to Ingram Ind	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Net FX Loss	(\$0)	\$5	\$1	\$2	\$0	\$0	\$3	\$0	\$0	\$0	\$0	\$0	\$0
Other	\$12	\$14	\$2	\$3	\$0	\$0	\$5	\$0	\$0	\$0	\$0	\$0	\$0
Total Other Expense	\$46	\$65	\$11	\$14	\$13	\$12	\$50	\$13	\$13	\$13	\$12	\$50	\$49
Pretax Income	\$430	\$398	\$94	\$83	\$86	\$135	\$398	\$94	\$94	\$97	\$145	\$430	\$473
Provision for Tax	\$120	\$122	\$27	\$24	\$27	\$43	\$122	\$30	\$30	\$31	\$46	\$138	\$151
Effective Tax Rate	27.9%	30.6%	28.9%	28.8%	32.0%	32.0%	30.6%	32.0%	32.0%	32.0%	32.0%	32.0%	32.0%
<b>Net Income (non-GAAP)</b>	<b>\$310.44</b>	<b>\$275.91</b>	<b>\$66.83</b>	<b>\$59.46</b>	<b>\$58.21</b>	<b>\$91.62</b>	<b>\$276.11</b>	<b>\$64.03</b>	<b>\$63.97</b>	<b>\$66.01</b>	<b>\$98.72</b>	<b>\$292.72</b>	<b>\$321.50</b>
Net Income (GAAP)	\$310.44	\$247.07	\$89.97	\$61.27	\$58.21	\$91.62	\$301.07	\$64.03	\$63.97	\$66.01	\$98.72	\$292.72	\$321.50
<b>EPS (Non-GAAP)</b>	<b>\$1.90</b>	<b>\$1.74</b>	<b>\$0.43</b>	<b>\$0.39</b>	<b>\$0.38</b>	<b>\$0.60</b>	<b>\$1.79</b>	<b>\$0.42</b>	<b>\$0.42</b>	<b>\$0.43</b>	<b>\$0.65</b>	<b>\$1.92</b>	<b>\$2.13</b>
EPS (GAAP)	\$1.90	\$1.56	\$0.58	\$0.40	\$0.38	\$0.60	\$1.96	\$0.42	\$0.42	\$0.43	\$0.65	\$1.92	\$2.13
Average Ordinary Shares	163.8	159.3	154.6	154.0	153.2	153.7	153.9	153.5	152.8	152.0	151.3	152.4	151.0
Average Diluted Shares	163.8	159.3	154.6	154.0	153.2	153.7	153.9	153.5	152.8	152.0	151.3	152.3	151.0
<b>% of Revenue</b>													
Gross Profit	5.44%	5.25%	5.41%	5.25%	5.28%	5.48%	5.34%	5.23%	5.23%	5.33%	5.53%	5.33%	5.38%
SG&A	3.99%	3.89%	4.09%	3.99%	4.10%	3.98%	4.04%	3.96%	3.95%	4.04%	3.95%	3.97%	3.94%
Op Income	1.38%	1.27%	1.21%	1.11%	1.11%	1.43%	1.23%	1.19%	1.20%	1.21%	1.51%	1.28%	1.36%
Net Interest Expense	0.13%	0.18%	0.12%	0.16%	0.14%	0.12%	0.14%	0.14%	0.14%	0.14%	0.12%	0.13%	0.13%
Net Income	0.90%	0.76%	0.77%	0.68%	0.65%	0.89%	0.76%	0.71%	0.72%	0.73%	0.95%	0.78%	0.84%
<b>% Change Year to Year</b>													
Revenue	17.2%	5.0%	-1.0%	0.3%	-0.2%	3.2%	0.7%	3.9%	1.6%	1.8%	1.7%	2.2%	2.3%
COGS	17.4%	5.2%	-1.2%	0.4%	-0.5%	3.3%	0.6%	4.2%	1.5%	1.7%	1.6%	2.2%	2.3%
Gross Profit	13.4%	1.3%	3.0%	-1.4%	6.4%	1.4%	2.3%	0.3%	2.9%	2.8%	2.6%	2.2%	3.3%
Op Ex	5.1%	2.6%	1.5%	-0.6%	5.2%	11.1%	4.4%	0.5%	0.7%	0.2%	0.9%	0.6%	1.4%
Op Income	46.3%	-2.9%	4.6%	0.7%	15.3%	-18.4%	-3.2%	2.0%	9.2%	11.3%	6.9%	7.2%	8.5%
Interest & Other Expense (Income)	47.1%	33.8%	-11.1%	-19.1%	15.6%	26.2%	1.8%	28.6%	30.3%	0.0%	0.0%	12.8%	0.0%
Net Income	40.1%	-11.1%	18.7%	-0.5%	11.6%	-14.9%	0.1%	-4.2%	7.6%	13.4%	7.7%	6.0%	9.8%
EPS	42.4%	-8.1%	26.3%	5.1%	14.2%	-15.1%	2.9%	-3.5%	8.4%	14.2%	9.4%	7.1%	10.7%

Source: Company report, Citi Research

Figure 4. IM Balance Sheet & Cash Flow Statement (detailed model available upon request)

<b>Balance Sheet (IM)</b>													
Fiscal Year Ends December													
Dollars in Millions	FY10	FY11	Q1	Q2	Q3E	Q4E	FY12E	Q1E	Q2E	Q3E	Q4E	FY13E	FY14E
			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
Cash and equivalents	\$1,156	\$891	\$991	\$981	\$1,183	\$1,144	\$1,144	\$1,065	\$1,137	\$1,320	\$1,260	\$1,260	\$1,473
Accounts receivable	\$4,139	\$4,465	\$3,881	\$3,690	\$3,730	\$4,607	\$4,607	\$4,034	\$3,748	\$3,797	\$4,685	\$4,685	\$4,801
Inventories	\$2,915	\$2,942	\$3,180	\$3,194	\$3,097	\$3,035	\$3,035	\$3,306	\$3,245	\$3,153	\$3,087	\$3,087	\$3,163
Other current assets	\$381	\$320	\$348	\$336	\$318	\$330	\$330	\$362	\$342	\$324	\$335	\$335	\$344
<b>Total Current Assets</b>	<b>\$8,590</b>	<b>\$8,618</b>	<b>\$8,401</b>	<b>\$8,202</b>	<b>\$8,327</b>	<b>\$9,116</b>	<b>\$9,116</b>	<b>\$8,767</b>	<b>\$8,472</b>	<b>\$8,593</b>	<b>\$9,367</b>	<b>\$9,367</b>	<b>\$9,781</b>
PP&E, net	\$247	\$323	\$338	\$344	\$354	\$363	\$363	\$371	\$380	\$387	\$394	\$394	\$422
Other Intangibles	\$82	\$73	\$71	\$68	\$68	\$68	\$68	\$68	\$68	\$68	\$68	\$68	\$68
Other assets	\$165	\$132	\$118	\$139	\$128	\$136	\$136	\$123	\$142	\$130	\$138	\$138	\$141
<b>Total Assets</b>	<b>\$9,084</b>	<b>\$9,147</b>	<b>\$8,928</b>	<b>\$8,753</b>	<b>\$8,876</b>	<b>\$9,681</b>	<b>\$9,681</b>	<b>\$9,329</b>	<b>\$9,061</b>	<b>\$9,178</b>	<b>\$9,967</b>	<b>\$9,967</b>	<b>\$10,412</b>
Accounts payable	\$4,594	\$4,893	\$4,626	\$4,409	\$4,437	\$5,053	\$5,053	\$4,818	\$4,476	\$4,515	\$5,136	\$5,136	\$5,261
Accrued expenses	\$536	\$524	\$394	\$422	\$447	\$582	\$582	\$397	\$425	\$449	\$587	\$587	\$610
Short-term Debt and Current Portion of LT Debt	\$105	\$92	\$88	\$143	\$143	\$143	\$143	\$143	\$143	\$143	\$143	\$143	\$143
<b>Total Current Liabilities</b>	<b>\$5,235</b>	<b>\$5,510</b>	<b>\$5,108</b>	<b>\$4,974</b>	<b>\$5,028</b>	<b>\$5,779</b>	<b>\$5,779</b>	<b>\$5,358</b>	<b>\$5,044</b>	<b>\$5,107</b>	<b>\$5,867</b>	<b>\$5,867</b>	<b>\$6,014</b>
Long-term Debt	\$531	\$300	\$300	\$320	\$320	\$320	\$320	\$320	\$320	\$320	\$320	\$320	\$320
Deferred income tax and other	\$77	\$64	\$83	\$80	\$91	\$54	\$54	\$84	\$90	\$104	\$58	\$58	\$59
<b>Total Liabilities</b>	<b>\$5,843</b>	<b>\$5,874</b>	<b>\$5,492</b>	<b>\$5,374</b>	<b>\$5,440</b>	<b>\$6,153</b>	<b>\$6,153</b>	<b>\$5,762</b>	<b>\$5,454</b>	<b>\$5,531</b>	<b>\$6,245</b>	<b>\$6,245</b>	<b>\$6,394</b>
Class A Common	\$2	\$2	\$2	\$2	\$2	\$2	\$2	\$2	\$2	\$2	\$2	\$2	\$2
Additional Paid In Capital	\$1,259	\$1,317	\$1,335	\$1,346	\$1,346	\$1,346	\$1,346	\$1,346	\$1,346	\$1,346	\$1,346	\$1,346	\$1,346
Retained Earnings	\$2,201	\$2,445	\$2,535	\$2,596	\$2,654	\$2,746	\$2,746	\$2,810	\$2,874	\$2,940	\$3,039	\$3,039	\$3,360
Accum Other Comprehensive (Loss) Income	\$168	\$114	\$163	\$82	\$82	\$82	\$82	\$82	\$82	\$82	\$82	\$82	\$82
Unearned Income and Other	(\$389)	(\$604)	(\$599)	(\$648)	(\$648)	(\$648)	(\$648)	(\$673)	(\$698)	(\$723)	(\$748)	(\$748)	(\$772)
<b>Total Shareholders' Equity</b>	<b>\$3,241</b>	<b>\$3,273</b>	<b>\$3,436</b>	<b>\$3,378</b>	<b>\$3,437</b>	<b>\$3,528</b>	<b>\$3,528</b>	<b>\$3,567</b>	<b>\$3,606</b>	<b>\$3,647</b>	<b>\$3,721</b>	<b>\$3,721</b>	<b>\$4,018</b>
<b>Total Liabilities and Equity</b>	<b>\$9,084</b>	<b>\$9,147</b>	<b>\$8,928</b>	<b>\$8,753</b>	<b>\$8,876</b>	<b>\$9,681</b>	<b>\$9,681</b>	<b>\$9,329</b>	<b>\$9,061</b>	<b>\$9,178</b>	<b>\$9,967</b>	<b>\$9,967</b>	<b>\$10,412</b>

<b>Cash Flow Statement (IM)</b>													
Fiscal Year Ends December													
Dollars in Millions	FY10	FY11	Q1	Q2	Q3E	Q4E	FY12E	Q1E	Q2E	Q3E	Q4E	FY13E	FY14E
			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
Net Income	\$318	\$244	\$90	\$61	\$58	\$92	\$301	\$64	\$64	\$66	\$99	\$293	\$321
Depreciation	\$62	\$57	\$14	\$14	\$14	\$15	\$57	\$15	\$16	\$16	\$17	\$64	\$72
Deferred income taxes	(\$8)	\$29	\$21	(\$1)	\$0	\$0	\$19	\$0	\$0	\$0	\$0	\$0	\$0
Noncash interest exp. on debentures	\$1	\$2	\$0	\$0	\$0	\$0	\$1	\$0	\$0	\$0	\$0	\$0	\$0
Gain/Loss on Sale of a Business	(\$2)	(\$0)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Stock based compensation	\$27	\$31	\$9	\$5	\$0	\$0	\$15	\$0	\$0	\$0	\$0	\$0	\$0
Excess tax benefit from stock-based comp	(\$4)	(\$3)	(\$5)	(\$0)	\$0	\$0	(\$5)	\$0	\$0	\$0	\$0	\$0	\$0
Accounts receivable	(\$209)	(\$426)	\$645	\$105	(\$40)	(\$877)	(\$167)	\$572	\$286	(\$48)	(\$888)	(\$78)	(\$116)
Inventories	(\$422)	(\$79)	(\$198)	(\$81)	\$97	\$62	(\$120)	(\$270)	\$61	\$92	\$66	(\$51)	(\$76)
Other current assets	\$83	\$48	(\$11)	(\$18)	\$19	(\$12)	(\$22)	(\$32)	\$20	\$18	(\$12)	(\$6)	(\$8)
Accounts payable	\$233	\$407	(\$299)	(\$129)	\$28	\$616	\$217	(\$235)	(\$342)	\$39	\$622	\$83	\$124
Accrued expenses	\$100	(\$20)	(\$176)	\$36	\$25	\$135	\$20	(\$186)	\$29	\$23	\$139	\$5	\$22
<b>Cash Flow from Operations</b>	<b>\$179</b>	<b>\$296</b>	<b>\$91</b>	<b>(\$7)</b>	<b>\$202</b>	<b>\$30</b>	<b>\$317</b>	<b>(\$72)</b>	<b>\$133</b>	<b>\$207</b>	<b>\$42</b>	<b>\$310</b>	<b>\$340</b>
Capital expenditures	(\$76)	(\$122)	(\$25)	(\$21)	(\$24)	(\$24)	(\$93)	(\$24)	(\$24)	(\$24)	(\$24)	(\$96)	(\$100)
Acquisitions	(\$8)	(\$2)	(\$0)	(\$0)	\$0	\$0	(\$0)	\$0	\$0	\$0	\$0	\$0	\$0
Sales of PP&E	\$4	\$1	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Proceeds from avail-for-sale securities	\$1	(\$1)	\$0	\$1	\$0	\$0	\$1	\$0	\$0	\$0	\$0	\$0	\$0
Other	\$0	\$0	\$0	\$0	\$12	(\$8)	\$4	\$13	(\$19)	\$12	(\$8)	(\$2)	(\$3)
<b>Cash Flows from Investing</b>	<b>(\$79)</b>	<b>(\$125)</b>	<b>(\$25)</b>	<b>(\$20)</b>	<b>(\$12)</b>	<b>(\$32)</b>	<b>(\$88)</b>	<b>(\$11)</b>	<b>(\$43)</b>	<b>(\$12)</b>	<b>(\$32)</b>	<b>(\$98)</b>	<b>(\$103)</b>
Issuance (Repurchase) of Class A Common	(\$152)	(\$226)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Exercise of stock options	\$38	\$39	\$20	\$8	\$0	\$0	\$29	\$0	\$0	\$0	\$0	\$0	\$0
Repurchase of Convertible Debentures	\$0	\$0	\$0	(\$50)	\$0	\$0	(\$50)	\$0	\$0	\$0	\$0	\$0	\$0
Change in Long Term Debt	\$285	(\$240)	\$0	\$0	\$12	(\$37)	(\$26)	\$30	\$6	\$14	(\$46)	\$4	\$1
Change in revolving credit facilities	\$0	\$0	(\$6)	\$81	\$0	\$0	\$74	\$0	\$0	\$0	\$0	\$0	\$0
Other	(\$24)	\$12	\$5	\$0	\$0	\$0	\$5	(\$25)	(\$25)	(\$25)	(\$25)	(\$100)	(\$24)
<b>Cash Flows from Financing</b>	<b>\$146</b>	<b>(\$414)</b>	<b>\$19</b>	<b>\$39</b>	<b>\$12</b>	<b>(\$37)</b>	<b>\$32</b>	<b>\$5</b>	<b>(\$19)</b>	<b>(\$11)</b>	<b>(\$71)</b>	<b>(\$96)</b>	<b>(\$23)</b>
Effect of FX on cash	(\$2)	(\$21)	\$14	(\$22)	\$0	\$0	(\$8)	\$0	\$0	\$0	\$0	\$0	\$0
<b>Net Change in Cash</b>	<b>\$245</b>	<b>(\$264)</b>	<b>\$100</b>	<b>(\$10)</b>	<b>\$202</b>	<b>(\$39)</b>	<b>\$253</b>	<b>(\$79)</b>	<b>\$71</b>	<b>\$183</b>	<b>(\$60)</b>	<b>\$116</b>	<b>\$213</b>
Begin Balance	\$911	\$1,156	\$891	\$991	\$981	\$1,183	\$891	\$1,144	\$1,065	\$1,137	\$1,320	\$1,260	\$1,444
<b>Ending Cash Balance</b>	<b>\$1,156</b>	<b>\$891</b>	<b>\$991</b>	<b>\$981</b>	<b>\$1,183</b>	<b>\$1,144</b>	<b>\$1,144</b>	<b>\$1,065</b>	<b>\$1,137</b>	<b>\$1,320</b>	<b>\$1,260</b>	<b>\$1,260</b>	<b>\$1,473</b>

Source: Company report, Citi Research



## Company Focus

- Company Update
- Initiation of Coverage

<b>Neutral</b>	<b>2</b>
Price (05 Oct 12)	US\$44.19
Target price	US\$48.00
Expected share price return	8.6%
Expected dividend yield	0.0%
<b>Expected total return</b>	<b>8.6%</b>
Market Cap	US\$1,668M

### Price Performance (RIC: TECD.O, BB: TECD US)



## Tech Data Corp (TECD)

### Integration and ERP Risk Pressuring Valuation Warranted

- **Stock Call** — We are initiating coverage of TECD with a Neutral rating and target price of \$48. We view the shares to be fairly valued given that risk/rewards seem relatively balanced. The positives we see are 1) shares are trading below book value, which provides some valuation support, 2) recent ERP roll-out issue was temporary, and should not recur, 3) accretion from purchase of remaining portion of Brightstar JV and SDG distribution assets is meaningful, and not reflected in street estimates. This is largely offset by the following negatives, which include 1) lingering macro concerns in Europe (more than 55% of revs), which could result in unexpected drop in revenues, 2) Ingram Micro's efforts to gain share could pose pricing and revenue risk, 3) valuation (relative to IM) is less attractive at 1x tangible book value.
- **What could make us more positive?** — We would become more constructive on the shares if the following catalysts materialize: 1) overall macro environment improves, particularly in Europe, 2) we see enough evidence that BrightStar does not pose a meaningful operational risk, 3) shares retreat more than 15% below tangible book, which is generally where the shares have troughed in the last 2-3 years.
- **What could make us more negative?** — We may become more negative on the shares if the following occurs: 1) further deterioration of the macro environment and IT demand, especially in Europe, 2) additional unexpected issues from the ERP roll-out, which undermines operations and leads to share loss, 3) IM becomes aggressive within the handset distribution business, negatively impacting the BrightStar business,
- **Valuation** — Our target price of \$48 is based on 8-9x F12-month EPS 12 months from now, which is the 3-year average PE multiple for the IT Distributors (IM, TECD, SNX). We highlight that we are modestly below consensus estimates given our more modest assumption for FY13 growth (+2% yoy growth vs consensus +3% growth) given a challenging IT demand environment, especially in Europe, with BYOD and other non PCs items (tablets) gaining traction. We are also below the street on GM assumptions given potential price aggression and risk on back-end incentives in case of a volume shortfall. Our view on the stock is relatively in line with consensus (30% buy, 50% hold, 20% sell ratings). Tangible book value is \$45.

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
<b>2012A</b>	1.03A	1.10A	1.26A	1.75A	5.09A	5.09A
<b>2013E</b>	<b>1.24A</b>	<b>0.88A</b>	<b>1.31E</b>	<b>1.80E</b>	<b>5.21E</b>	<b>5.38E</b>
Previous	na	na	na	na	na	na
<b>2014E</b>	<b>1.33E</b>	<b>1.31E</b>	<b>1.45E</b>	<b>1.90E</b>	<b>5.99E</b>	<b>6.14E</b>
Previous	na	na	na	na	na	na
<b>2015E</b>	<b>1.33E</b>	<b>1.32E</b>	<b>1.49E</b>	<b>2.09E</b>	<b>6.22E</b>	<b>6.33E</b>
Previous	na	na	na	na	na	na

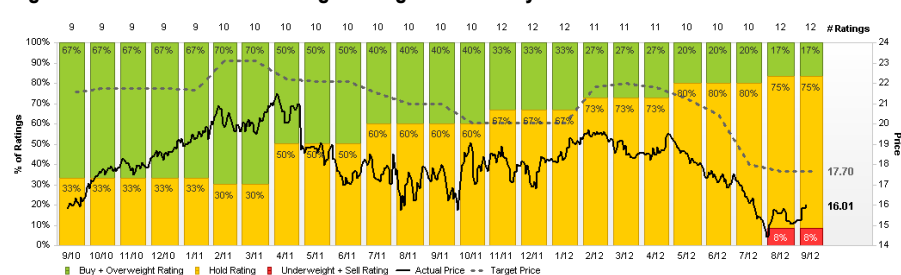
Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

## Recent Results and Outlook

Tech Data's F2Q13 (July quarter) revenues of \$5.96B (-8% yoy, +1% qoq) were modestly above consensus estimate of \$5.81B) despite the qoq currency headwind from the weaker Euro. European revenues of \$3.56B (-5% yoy, +4% qoq) were better than seasonal given volume uplift from Apple and easy comps. This was offset by a shortfall in the Americas revenues (\$2.4B, -11% yoy, -2% qoq) resulting from SAP ERP roll-out issues. The company expects the ERP transition to be largely behind them, and operations should improve in the October quarter. Gross margins of 5.05% plunged 38bps sequentially, which was equally attributed to pricing/mix and the aforementioned ERP issues. Apple become a top 2 vendor for the first time as roughly 12% of revenues during the July qtr were attributed to the company, which contributed to the upside in Europe. Reported EPS of \$0.88 were significantly below consensus of \$1.17.

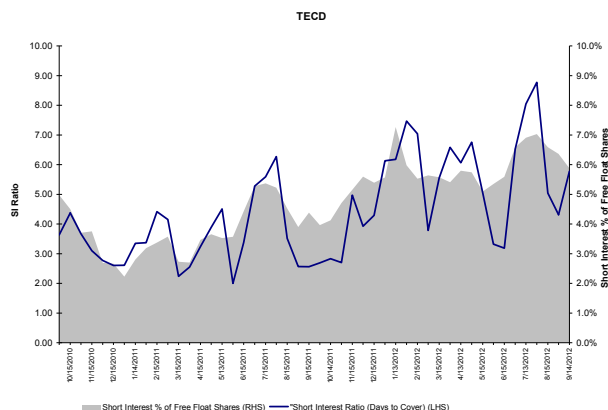
For F3Q13 (October quarter), the company expects revenues (in local currency) to be up mid-single digits in Europe, while revenues will be down mid-single digits in the Americas. Assuming a \$US/EU exchange rate of \$1.23, the guidance suggests that overall revenues will decline by 6% yoy (+4% qoq) to \$6.2B in total sales, which is slightly above consensus of \$6.12B. Management also anticipates gross and operating margin to improve sequentially as the company expects volumes to increase and with less impact from ERP issues. The company bought back \$143M during 2FQ, exhausting the remainder of their share repo authorization. Tech Data does not provide EPS guidance.

Figure 1. TECD Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Figure 2. TECD Short Interest Analysis



Source: FactSet and Citi Research

Figure 3. TECD Income Statement (detailed model available upon request)

Income Statement (TECD)													
Fiscal Year Ends January													
Dollars in Millions													
	FY11	FY12	Q1A	Q2A	Q3E	Q4E	FY13E	Q1E	Q2E	Q3E	Q4E	FY14E	FY15E
			Apr-12	Jul-12	Oct-12	Jan-13		Apr-13	Jul-13	Oct-13	Jan-14		
<b>Americas Revenues</b>	<b>\$10,535</b>	<b>\$10,839</b>	<b>\$2,454</b>	<b>\$2,400</b>	<b>\$2,592</b>	<b>\$2,618</b>	<b>\$10,064</b>	<b>\$2,435</b>	<b>\$2,527</b>	<b>\$2,597</b>	<b>\$2,690</b>	<b>\$10,248</b>	<b>\$10,605</b>
% chg yr to yr	10%	3%	-6%	-11%	-7%	-5%	-7%	-1%	5%	0%	3%	2%	3%
% chg qtr to qtr	-	-	-11%	-2%	8%	1%	-	-7%	4%	3%	4%	-	-
<b>Europe Revenues</b>	<b>\$13,841</b>	<b>\$15,649</b>	<b>\$3,441</b>	<b>\$3,562</b>	<b>\$3,562</b>	<b>\$4,096</b>	<b>\$14,660</b>	<b>\$3,604</b>	<b>\$3,496</b>	<b>\$3,724</b>	<b>\$4,252</b>	<b>\$15,076</b>	<b>\$15,731</b>
% chg yr to yr	10%	13%	-7%	-5%	-7%	-6%	-6%	5%	-2%	5%	4%	3%	4%
% chg qtr to qtr	-	-	-21%	4%	0%	15%	-	-12%	-3%	6%	14%	-	-
<b>Revenue</b>	<b>\$24,376</b>	<b>\$26,488</b>	<b>\$5,896</b>	<b>\$5,962</b>	<b>\$6,153</b>	<b>\$6,714</b>	<b>\$24,724</b>	<b>\$6,039</b>	<b>\$6,024</b>	<b>\$6,320</b>	<b>\$6,942</b>	<b>\$25,325</b>	<b>\$26,336</b>
% chg qtr to qtr	0%	0%	-17%	1%	3%	9%	0%	-10%	0%	5%	10%	0%	0%
Cost of Sales	\$23,093	\$25,094	\$5,575	\$5,660	\$5,837	\$6,361	\$23,433	\$5,725	\$5,710	\$5,992	\$6,577	\$24,004	\$24,963
<b>Gross Profit</b>	<b>\$1,283</b>	<b>\$1,394</b>	<b>\$320</b>	<b>\$301</b>	<b>\$317</b>	<b>\$352</b>	<b>\$1,291</b>	<b>\$314</b>	<b>\$313</b>	<b>\$329</b>	<b>\$364</b>	<b>\$1,320</b>	<b>\$1,373</b>
SG&A	\$939	\$1,027	\$237	\$238	\$236	\$240	\$950	\$232	\$232	\$240	\$247	\$951	\$994
Options Expense, net of tax effect	\$10	\$11	\$3	\$4	\$4	\$4	\$15	\$4	\$4	\$4	\$4	\$17	\$17
<b>Operating Income</b>	<b>\$334</b>	<b>\$356</b>	<b>\$81</b>	<b>\$59</b>	<b>\$77</b>	<b>\$108</b>	<b>\$326</b>	<b>\$78</b>	<b>\$77</b>	<b>\$85</b>	<b>\$114</b>	<b>\$353</b>	<b>\$362</b>
Depreciation and Amortization	\$47	\$57	\$13	\$15	\$15	\$15	\$58	\$18	\$18	\$18	\$18	\$70	\$80
EBITDA	\$381	\$413	\$94	\$74	\$92	\$123	\$384	\$95	\$94	\$102	\$131	\$423	\$442
Interest Expense	\$31	\$33	\$3	\$4	\$4	\$4	\$14	\$4	\$4	\$4	\$4	\$15	\$15
Interest Income	(\$1)	(\$1)	(\$0)	(\$0)	(\$0)	(\$0)	(\$1)	(\$0)	(\$0)	(\$0)	(\$0)	(\$1)	(\$1)
FX (Gain) Loss	\$0	\$1	\$1	\$1	\$0	\$0	\$3	\$0	\$0	\$0	\$0	\$0	\$0
Pretax Income	\$304	\$324	\$76	\$55	\$74	\$105	\$310	\$74	\$73	\$81	\$110	\$339	\$348
Provision for Tax	\$85	\$88	\$23	\$16	\$21	\$30	\$90	\$22	\$21	\$24	\$31	\$98	\$100
Effective Tax Rate	27.9%	27.1%	30.0%	30.0%	28.8%	28.4%	29.2%	29.2%	29.4%	29.1%	28.2%	28.9%	28.7%
Non-GAAP Net Income before M.I.	\$219	\$236	\$54	\$38	\$53	\$75	\$220	\$53	\$52	\$57	\$79	\$241	\$248
Minority Interest	\$5	\$10	\$2	\$4	\$3	\$7	\$16	\$3	\$2	\$4	\$9	\$17	\$22
<b>Non-GAAP Net Income</b>	<b>\$214</b>	<b>\$226</b>	<b>\$52</b>	<b>\$34</b>	<b>\$50</b>	<b>\$68</b>	<b>\$204</b>	<b>\$50</b>	<b>\$49</b>	<b>\$54</b>	<b>\$70</b>	<b>\$224</b>	<b>\$226</b>
GAAP Net Income	\$214	\$206	\$52	\$34	\$50	\$68	\$204	\$50	\$49	\$54	\$70	\$224	\$226
<b>Diluted EPS</b>	<b>\$4.36</b>	<b>\$5.09</b>	<b>\$1.24</b>	<b>\$0.88</b>	<b>\$1.31</b>	<b>\$1.80</b>	<b>\$5.21</b>	<b>\$1.33</b>	<b>\$1.31</b>	<b>\$1.45</b>	<b>\$1.90</b>	<b>\$5.99</b>	<b>\$6.22</b>
Basic shares Outstanding	48.6	43.8	41.2	38.8	37.7	37.7	38.9	37.5	37.2	37.0	36.7	37.1	36.2
Diluted Shares Outstanding	49.1	44.4	41.6	39.1	38.0	37.9	39.1	37.7	37.4	37.2	37.0	37.3	36.4
<b>% of Revenue</b>													
Gross Profit	5.26%	5.26%	5.43%	5.05%	5.15%	5.25%	5.22%	5.20%	5.20%	5.20%	5.25%	5.21%	5.21%
SG&A	3.85%	3.88%	4.01%	3.99%	3.83%	3.58%	3.84%	3.84%	3.86%	3.80%	3.55%	3.76%	3.77%
Operating Income	1.37%	1.34%	1.37%	0.99%	1.26%	1.61%	1.32%	1.29%	1.27%	1.34%	1.64%	1.39%	1.37%
Net Interest Expense	0.13%	0.12%	0.06%	0.06%	0.06%	0.06%	0.06%	0.06%	0.06%	0.06%	0.05%	0.06%	0.06%
Pretax Income	1.25%	1.22%	1.30%	0.92%	1.20%	1.56%	1.25%	1.23%	1.21%	1.28%	1.59%	1.34%	1.32%
Net Income	0.88%	0.85%	0.88%	0.58%	0.81%	1.02%	0.82%	0.83%	0.82%	0.85%	1.01%	0.88%	0.86%
<b>% Change Year to Year</b>													
Revenue	10%	9%	-7%	-8%	-7%	-6%	-7%	2%	1%	3%	3%	2%	4%
COGS	10%	9%	-7%	-7%	-7%	-6%	-7%	3%	1%	3%	3%	2%	4%
Gross Profit	11%	9%	-4%	-12%	-8%	-6%	-7%	-2%	4%	4%	3%	2%	4%
SG&A	7%	9%	-7%	-8%	-7%	-8%	-7%	-2%	-2%	2%	3%	0%	5%
Op Income	27%	7%	7%	-25%	-14%	-3%	-8%	-4%	29%	9%	5%	8%	3%
Net Income	23%	5%	6%	-31%	-7%	-7%	-10%	-3%	43%	8%	3%	10%	1%
Earnings per Share	27%	17%	21%	-20%	4%	3%	2%	7%	49%	11%	6%	15%	4%

Source: Company report, Citi Research

Figure 4. TECD Balance Sheet & Cash Flow Statement (detailed model available upon request)

Balance Sheet (TECD)													
Fiscal Year Ends January	FY11	FY12	Q1A	Q2A	Q3E	Q4E	FY13E	Q1E	Q2E	Q3E	Q4E	FY14E	FY15E
Dollars in Millions			Apr-12	Jul-12	Oct-12	Jan-13		Apr-13	Jul-13	Oct-13	Jan-14		
Cash and equivalents	\$840	\$505	\$447	\$278	\$569	\$430	\$430	\$346	\$413	\$675	\$528	\$528	\$595
Accounts receivable, net	\$2,897	\$2,871	\$2,656	\$2,623	\$2,800	\$2,800	\$2,800	\$2,721	\$2,650	\$2,876	\$2,895	\$2,895	\$3,062
Inventories	\$2,205	\$1,803	\$1,949	\$1,819	\$1,900	\$1,900	\$1,900	\$1,997	\$1,838	\$1,952	\$1,965	\$1,965	\$2,078
Prepaid and other	\$181	\$203	\$185	\$199	\$200	\$200	\$200	\$181	\$195	\$204	\$205	\$205	\$215
Total Current Assets	\$6,123	\$5,382	\$5,237	\$4,919	\$5,469	\$5,330	\$5,330	\$5,245	\$5,096	\$5,707	\$5,593	\$5,593	\$5,950
PP&E, gross	\$423	\$425	\$426	\$421	\$417	\$413	\$413	\$409	\$405	\$401	\$397	\$397	\$381
Accumulated depreciation	(\$329)	(\$337)	(\$338)	(\$339)	(\$340)	(\$341)	(\$341)	(\$342)	(\$343)	(\$344)	(\$345)	(\$345)	(\$349)
PP&E, net	\$94	\$89	\$88	\$82	\$77	\$72	\$72	\$67	\$62	\$57	\$52	\$52	\$32
Goodwill	\$70	\$97	\$97	\$97	\$97	\$97	\$97	\$97	\$97	\$97	\$97	\$97	\$97
Non-current intangible assets	\$138	\$146	\$152	\$140	\$140	\$140	\$140	\$140	\$140	\$140	\$140	\$140	\$140
Other assets	\$62	\$72	\$69	\$63	\$79	\$66	\$66	\$68	\$61	\$81	\$68	\$68	\$71
Total Assets	\$6,488	\$5,785	\$5,644	\$5,301	\$5,862	\$5,705	\$5,705	\$5,617	\$5,456	\$6,082	\$5,951	\$5,951	\$6,290
Revolving credit loans	\$434	\$48	\$31	\$38	\$38	\$38	\$38	\$38	\$38	\$38	\$38	\$38	\$38
Accounts payable	\$3,224	\$3,043	\$2,952	\$2,863	\$3,200	\$3,100	\$3,100	\$3,031	\$2,888	\$3,285	\$3,205	\$3,205	\$3,390
Accrued expenses	\$563	\$551	\$483	\$445	\$600	\$500	\$500	\$474	\$434	\$611	\$514	\$514	\$537
Total Current Liabilities	\$4,221	\$3,643	\$3,466	\$3,345	\$3,838	\$3,638	\$3,638	\$3,543	\$3,360	\$3,934	\$3,757	\$3,757	\$3,965
Other Liabilities	\$69	\$83	\$82	\$81	\$100	\$100	\$100	\$81	\$79	\$102	\$103	\$103	\$107
Long-term debt	\$60	\$57	\$58	\$54	\$54	\$54	\$54	\$54	\$54	\$54	\$54	\$54	\$54
Total Liabilities	\$4,350	\$3,783	\$3,606	\$3,480	\$3,992	\$3,792	\$3,792	\$3,678	\$3,493	\$4,090	\$3,913	\$3,913	\$4,126
Minority Interest	\$0	\$28	\$31	\$28	\$28	\$28	\$28	\$28	\$28	\$28	\$28	\$28	\$28
APIC	\$744	\$770	\$751	\$751	\$751	\$751	\$751	\$751	\$751	\$751	\$751	\$751	\$751
Treasury stock	(\$532)	(\$740)	(\$767)	(\$910)	(\$910)	(\$935)	(\$935)	(\$960)	(\$985)	(\$1,010)	(\$1,035)	(\$1,035)	(\$1,135)
Retained Earnings	\$1,696	\$1,660	\$1,711	\$1,641	\$1,690	\$1,758	\$1,758	\$1,809	\$1,858	\$1,912	\$1,982	\$1,982	\$2,208
Cum translation adjustment	\$235	\$284	\$311	\$311	\$311	\$311	\$311	\$311	\$311	\$311	\$311	\$311	\$311
Total Shareholders' Equity	\$2,138	\$2,002	\$2,038	\$1,821	\$1,871	\$1,914	\$1,914	\$1,939	\$1,963	\$1,992	\$2,037	\$2,037	\$2,164
Total Liabilities and Equity	\$6,488	\$5,785	\$5,644	\$5,301	\$5,862	\$5,705	\$5,705	\$5,617	\$5,456	\$6,082	\$5,951	\$5,951	\$6,290

Cash Flow Statement (TECD)													
Fiscal Year Ends January	FY11	FY12	Q1A	Q2A	Q3E	Q4E	FY13E	Q1E	Q2E	Q3E	Q4E	FY14E	FY15E
Dollars in Millions			Apr-12	Jul-12	Oct-12	Jan-13		Apr-13	Jul-13	Oct-13	Jan-14		
Net Income	\$219	\$217	\$54	\$34	\$50	\$68	\$206	\$50	\$49	\$54	\$70	\$224	\$226
Depreciation	\$47	\$57	\$13	\$15	\$15	\$15	\$58	\$18	\$18	\$18	\$18	\$70	\$80
Amortization	\$0	\$0	\$0	\$12	\$0	\$0	\$12	\$0	\$0	\$0	\$0	\$0	\$0
Provision for A/R losses	\$12	\$11	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Loss on disposal of fixed assets/subsidiary	\$0	\$28	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Stock-based compensation expense	\$10	\$11	\$3	\$0	\$0	\$0	\$3	\$0	\$0	\$0	\$0	\$0	\$0
Other	\$16	(\$23)	(\$4)	\$1	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Accounts receivable	(\$113)	(\$49)	\$251	\$33	(\$177)	\$0	\$107	\$79	\$71	(\$226)	(\$19)	(\$95)	(\$167)
Inventories	(\$349)	\$371	(\$129)	\$130	(\$81)	\$0	(\$80)	(\$97)	\$159	(\$113)	(\$13)	(\$65)	(\$113)
Prepaid and other	(\$35)	(\$43)	\$34	(\$14)	(\$1)	\$0	\$19	\$19	(\$13)	(\$9)	(\$2)	(\$5)	(\$9)
Accounts Payable	\$278	(\$41)	(\$126)	(\$89)	\$337	(\$100)	\$22	(\$69)	(\$143)	\$397	(\$80)	\$105	\$185
Accrued expenses	\$19	(\$35)	(\$88)	(\$38)	\$155	(\$100)	(\$71)	(\$26)	(\$39)	\$177	(\$97)	\$14	\$23
Cash Flow from Operations	\$104	\$503	\$8	\$84	\$298	(\$117)	\$277	(\$26)	\$100	\$297	(\$123)	\$247	\$225
Acquisitions	(\$141)	(\$25)	(\$9)	\$0	\$0	\$0	(\$9)	\$0	\$0	\$0	\$0	\$0	\$0
Capital expenditures	(\$19)	(\$13)	(\$4)	(\$10)	(\$10)	(\$10)	(\$34)	(\$13)	(\$13)	(\$13)	(\$13)	(\$50)	(\$60)
Software development costs	(\$13)	(\$31)	(\$8)	\$0	\$0	\$0	(\$8)	\$0	\$0	\$0	\$0	\$0	\$0
Change in other assets	\$0	\$0	\$0	\$6	(\$16)	\$13	\$3	(\$1)	\$6	(\$19)	\$13	(\$2)	(\$3)
Change in Minority Interest	\$0	\$0	\$0	(\$3)	\$0	\$0	(\$3)	\$0	\$0	\$0	\$0	\$0	\$0
Cash Flow from Investing	(\$173)	(\$69)	(\$21)	(\$7)	(\$26)	\$3	(\$51)	(\$14)	(\$6)	(\$32)	\$0	(\$52)	(\$63)
Issuance of common stock	\$5	\$35	\$3	\$0	\$0	\$0	\$3	\$0	\$0	\$0	\$0	\$0	\$0
Change in revolving credit facilities	(\$47)	(\$41)	(\$17)	\$5	\$19	\$0	\$7	(\$19)	(\$2)	\$23	\$1	\$3	\$5
Change in long-term debt	(\$0)	(\$352)	(\$0)	(\$4)	\$0	\$0	(\$4)	\$0	\$0	\$0	\$0	\$0	\$0
Other (incl. Loans to Macrotron)	(\$164)	(\$312)	(\$38)	(\$249)	\$0	(\$25)	(\$311)	(\$25)	(\$25)	(\$25)	(\$25)	(\$100)	(\$100)
Cash Flow from Financing	(\$206)	(\$671)	(\$52)	(\$247)	\$19	(\$25)	(\$306)	(\$44)	(\$27)	(\$2)	(\$24)	(\$97)	(\$95)
Translation Adjustment	(\$1)	(\$22)	\$7	\$0	\$0	\$0	\$7	\$0	\$0	\$0	\$0	\$0	\$0
Net Change in Cash	(\$277)	(\$259)	(\$58)	(\$169)	\$291	(\$139)	(\$72)	(\$84)	\$67	\$263	(\$147)	\$98	\$66
Beginning Balance	\$1,117	\$764	\$505	\$447	\$278	\$569	\$505	\$430	\$346	\$413	\$675	\$430	\$528
Ending Cash Balance	\$840	\$505	\$447	\$278	\$569	\$430	\$433	\$346	\$413	\$675	\$528	\$528	\$595

Source: Company report, Citi Research

## Company Focus

- Company Update
- Initiation of Coverage

<b>Neutral</b>	<b>2</b>
Price (05 Oct 12)	US\$32.77
Target price	US\$35.00
Expected share price return	6.8%
Expected dividend yield	0.0%
<b>Expected total return</b>	<b>6.8%</b>
Market Cap	US\$1,223M

### Price Performance (RIC: SNX.N, BB: SNX US)



## Synnex Corp (SNX)

### Exposure to US Consumer and Japan Limits Upside

- **Stock Call** – We have a Neutral rating on SNX shares with a target of \$35. We view the shares to be fairly valued given that risk/reward seems relatively balanced. The positives are 1) SNX has a much better track record in consistent execution, relative to its peers, partly due to its historical focus in a single region (North America), more focused line card, and a home grown ERP system, 2) build out of value-added services (ie. BPO) offers healthy opportunities for margin expansion and earnings growth. This is largely offset by the following negatives, which include 1) we believe valuation does not look particularly attractive with the shares trading above tangible book value; shares have troughed at 5-10% below tangible book during last 2-3 years, 2) the recent entry into the Japan market (via the Marubeni acquisition) poses a risk if the regional macro environment deteriorates, 3) relatively high level of exposure to US consumer retail, which remains weaker than corporate, 4) Exposure to HP is disproportionately high at 36% of revs (vs 20-25% for IM and TECD) is a potential risk given the current operational woes of that particular vendor. US consumer 15-20% and Japan is 10-15% of the company's sales which we believe could limit upside to consensus.
- **What could make us more positive?** – We would become more constructive on the shares if the following catalysts materialize: 1) overall macro environment improves, particularly in North America, 2) signs that the US consumer market is improving given exposure to that segment, 3) meaningful growth in the Japan IT market and/or meaningful share within that region, 4) faster-than-expected growth or margin recovery in the GBS business, and 5) shares retreat meaningfully below tangible book.
- **What could make us more negative?** – We may become more negative on the shares if the following occurs: 1) further deterioration of the macro environment and North American IT demand, 2) further price aggression by larger competitors such as IM and TECD in light of weaker demand, 3) the industry shift to cloud computing begins to meaningfully disintermediate the channel, and 4) slower than expected growth or margin expansion within GBS.
- **Valuation** — Our target price of \$35 is based on 8-9x F12-month EPS 12 months from now, which is the 3-year average PE multiple for the IT Distributors (IM, TECD, SNX). We highlight that we are below consensus estimates given our more modest assumption for FY13 growth (flat yoy growth vs consensus +4% growth) given a challenging IT demand environment, particularly in consumer with BYOD and other non PCs items (tablets) gaining traction. Our view on the stock is relatively inline versus consensus (50% buy, 50% hold ratings). Tangible book value is \$29.

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
2011A	0.82A	0.85A	1.07A	1.37A	4.11A	4.11A
2012E	1.02A	0.90A	0.93A	1.02E	3.86E	3.87E
Previous	na	na	na	na	na	na
2013E	0.91E	0.94E	1.02E	1.28E	4.15E	4.13E
Previous	na	na	na	na	na	na
2014E	0.98E	1.02E	1.12E	1.41E	4.53E	4.72E
Previous	na	na	na	na	na	na

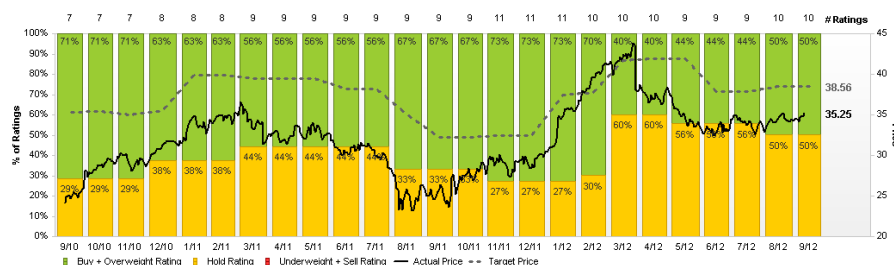
Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

## Recent Results and Outlook

SNX reported F3Q12 (August quarter) revenues of \$2.58B (flat yoy, 4% qoq), roughly in line with consensus estimate of \$2.59B. While Distribution revenues of \$2.54B (flat yoy, 4% qoq) were in line with consensus, they were below seasonality given continued weakness in consumer. Meanwhile, GBS revenues of \$49.7M (23% yoy, 4% qoq) were in line with expectations with multi-year Concentrix contracts beginning to drive organic growth. Mgt noted that 2/3 of the yoy growth was still driven by acquisitions. Despite solid top-line, gross margins declined 40bps qoq to 5.9% due to price aggression, negative product mix, and a one-off charge in Japan. While pre-tax income was lower than expected, EPS of \$0.93 came in line with expectations due to a \$0.04 benefit from lower tax and share count.

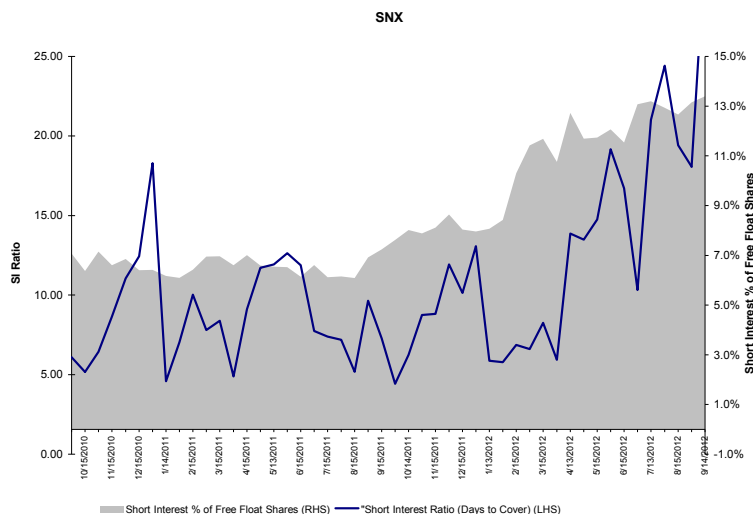
For F4Q12 (November quarter), the company expects revenues in the range of \$2.71-\$2.81B, and EPS of \$1.02-1.06, both which are below consensus of \$2.86/\$1.16. The below consensus revenue guidance was attributed to continued weakness in consumer demand. While Win 8 is launching in the quarter, the company does not believe that the November quarter will materially benefit since the launch will occur toward the back half of the quarter. Mgt remains confident that they are on track to achieve double digit operating margins, but given various investments for growth, the margins in 4FQ will likely remain in the single digits.

Figure 1. SNX Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Figure 2. SNX Short Interest Analysis



Source: FactSet and Citi Research

Figure 3. SNX Income Statement (detailed model available upon request)

Income Statement (SNX)													
Fiscal Year Ends November													
Dollars in Thousands													
	FY10	FY11	Q1A	Q2A	Q3A	Q4E	FY12E	Q1E	Q2E	Q3E	Q4E	FY13E	FY14E
			Feb-12	May-12	Aug-12	Nov-12		Feb-13	May-13	Aug-13	Nov-13		
<b>Distribution</b>	<b>\$8,528</b>	<b>\$10,270</b>	<b>\$2,420</b>	<b>\$2,440</b>	<b>\$2,540</b>	<b>\$2,692</b>	<b>\$10,092</b>	<b>\$2,369</b>	<b>\$2,405</b>	<b>\$2,513</b>	<b>\$2,764</b>	<b>\$10,052</b>	<b>\$10,385</b>
% chg yr to yr	12%	20%	-2%	-1%	0%	-4%	-2%	-2%	-1%	-1%	3%	0%	3%
% chg qtr to qtr	-	-	-14%	1%	4%	6%	-	-12%	2%	5%	10%	-	-
<b>GBS (x-HiChina)</b>	<b>\$112</b>	<b>\$163</b>	<b>\$45</b>	<b>\$48</b>	<b>\$50</b>	<b>\$54</b>	<b>\$196</b>	<b>\$55</b>	<b>\$58</b>	<b>\$58</b>	<b>\$59</b>	<b>\$231</b>	<b>\$254</b>
% chg yr to yr	11%	45%	15%	23%	23%	20%	20%	23%	23%	16%	10%	18%	10%
% chg qtr to qtr	-	-	0%	6%	4%	8%	-	3%	6%	-1%	2%	-	-
<b>Revenue</b>	<b>\$8,614</b>	<b>\$10,410</b>	<b>\$2,461</b>	<b>\$2,483</b>	<b>\$2,577</b>	<b>\$2,741</b>	<b>\$10,262</b>	<b>\$2,420</b>	<b>\$2,458</b>	<b>\$2,566</b>	<b>\$2,818</b>	<b>\$10,262</b>	<b>\$10,619</b>
% chg qtr to qtr	-	-	-13%	1%	4%	6%	-	-12%	2%	4%	10%	-	-
Cost of Sales	\$8,123	\$9,779	\$2,291	\$2,326	\$2,425	\$2,574	\$9,617	\$2,276	\$2,311	\$2,411	\$2,645	\$9,642	\$9,972
<b>Gross Profit</b>	<b>\$492</b>	<b>\$630</b>	<b>\$169</b>	<b>\$156</b>	<b>\$152</b>	<b>\$167</b>	<b>\$645</b>	<b>\$144</b>	<b>\$147</b>	<b>\$155</b>	<b>\$173</b>	<b>\$620</b>	<b>\$647</b>
SG&A	\$284	\$365	\$103	\$95	\$93	\$99	\$389	\$84	\$86	\$89	\$91	\$350	\$353
Options Expense	\$9	\$8	\$2	\$2	\$2	\$2	\$9	\$2	\$2	\$2	\$2	\$9	\$9
<b>Operating Income</b>	<b>\$199</b>	<b>\$257</b>	<b>\$64</b>	<b>\$59</b>	<b>\$57</b>	<b>\$66</b>	<b>\$247</b>	<b>\$58</b>	<b>\$59</b>	<b>\$64</b>	<b>\$80</b>	<b>\$262</b>	<b>\$285</b>
Depreciation & Amortization	\$16	\$25	\$6	\$6	\$5	\$5	\$22	\$5	\$5	\$5	\$5	\$20	\$20
EBITDA	\$215	\$282	\$70	\$66	\$62	\$71	\$269	\$63	\$64	\$69	\$85	\$281	\$305
Interest Expense, Net	(\$17)	(\$26)	(\$6)	(\$6)	(\$6)	(\$7)	(\$25)	(\$5)	(\$5)	(\$5)	(\$5)	(\$20)	(\$19)
Other, Net	\$2	(\$1)	\$2	(\$0)	\$1	\$0	\$3	\$0	\$0	\$0	\$0	\$0	\$0
Pre-tax Income	\$184	\$231	\$60	\$53	\$52	\$59	\$225	\$53	\$54	\$59	\$75	\$242	\$266
Provision for Tax	\$67	\$79	\$21	\$19	\$17	\$21	\$77	\$19	\$19	\$21	\$26	\$85	\$93
Effective Tax Rate	36.4%	34.3%	34.8%	34.8%	33.2%	35.0%	34.5%	35.0%	35.0%	35.0%	35.0%	35.0%	35.0%
Non-GAAP Net Income before Minority	\$117	\$152	\$39	\$35	\$35	\$38	\$147	\$34	\$35	\$39	\$49	\$157	\$173
Minority Interest	(\$0)	(\$0)	(\$1)	(\$0)	\$0	\$0	(\$1)	\$0	\$0	\$0	\$0	\$1	\$1
<b>Non-GAAP Net Income</b>	<b>\$117</b>	<b>\$151</b>	<b>\$38</b>	<b>\$34</b>	<b>\$35</b>	<b>\$39</b>	<b>\$146</b>	<b>\$35</b>	<b>\$36</b>	<b>\$39</b>	<b>\$49</b>	<b>\$158</b>	<b>\$174</b>
Extraordinary, Unusual, One-time, etc.	\$11	(\$1)	\$1	\$0	\$0	\$0	\$1	\$0	\$0	\$0	\$0	\$0	\$0
GAAP Net Income	\$128	\$151	\$39	\$35	\$35	\$39	\$148	\$35	\$36	\$39	\$49	\$158	\$174
Basic Non-GAAP EPS	\$3.35	\$4.22	\$1.05	\$0.94	\$0.96	\$1.05	\$4.00	\$0.94	\$0.97	\$1.05	\$1.33	\$4.29	\$4.68
<b>Diluted Non-GAAP EPS</b>	<b>\$3.26</b>	<b>\$4.11</b>	<b>\$1.02</b>	<b>\$0.90</b>	<b>\$0.93</b>	<b>\$1.02</b>	<b>\$3.86</b>	<b>\$0.91</b>	<b>\$0.94</b>	<b>\$1.02</b>	<b>\$1.28</b>	<b>\$4.15</b>	<b>\$4.53</b>
Basic Shares Outstanding	34.7	35.8	36.3	36.6	36.7	36.8	36.6	36.8	36.9	36.9	37.0	36.9	37.2
Diluted Shares Outstanding	35.8	36.8	37.6	38.3	37.9	38.0	38.0	38.0	38.1	38.2	38.2	38.1	38.4
<b>% of Revenue</b>													
Gross Profit	5.71%	6.06%	6.88%	6.30%	5.90%	6.10%	6.28%	5.95%	6.00%	6.05%	6.15%	6.04%	6.09%
SG&A	3.29%	3.51%	4.20%	3.82%	3.60%	3.60%	3.80%	3.46%	3.49%	3.46%	3.23%	3.41%	3.32%
Options Expense	0.10%	0.08%	0.08%	0.09%	0.09%	0.08%	0.08%	0.09%	0.09%	0.09%	0.08%	0.09%	0.08%
Operating Income	2.31%	2.47%	2.60%	2.39%	2.21%	2.42%	2.40%	2.40%	2.42%	2.50%	2.84%	2.55%	2.69%
Net Interest Expense	-0.20%	-0.25%	-0.25%	-0.22%	-0.23%	-0.27%	-0.24%	-0.21%	-0.20%	-0.19%	-0.18%	-0.19%	-0.18%
Pretax Income	2.13%	2.22%	2.44%	2.15%	2.02%	2.16%	2.19%	2.19%	2.22%	2.31%	2.66%	2.36%	2.50%
Net Income	1.35%	1.45%	1.55%	1.38%	1.36%	1.41%	1.43%	1.43%	1.45%	1.52%	1.74%	1.54%	1.64%
	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
<b>% Change Year to Year</b>													
Revenue	11%	21%	-2%	-1%	0%	-4%	-1%	-2%	-1%	0%	3%	0%	3%
COGS	11%	20%	-3%	-1%	0%	-3%	-2%	-1%	-1%	-1%	3%	0%	3%
Gross Profit	12%	28%	18%	8%	-1%	-11%	2%	-15%	-6%	2%	4%	-4%	4%
SG&A	2%	29%	14%	7%	9%	-2%	7%	-19%	-10%	-4%	-8%	-10%	1%
Options Expense	6%	-8%	4%	12%	13%	4%	8%	10%	-1%	0%	0%	2%	0%
Op Income	30%	29%	24%	9%	-14%	-22%	-4%	-9%	0%	13%	20%	6%	9%
Net Income	28%	30%	26%	8%	-10%	-23%	-3%	-9%	4%	11%	27%	8%	10%
Earnings per Share	22%	26%	23%	5%	-13%	-25%	-6%	-10%	5%	10%	26%	8%	9%

Source: Company report, Citi Research



Figure 4. SNX Balance Sheet & Cash Flow Statement (detailed model available upon request)

**Balance Sheet (SNX)**

Fiscal Year Ends November  
Dollars in Thousands

	FY10	FY11	Q1A	Q2A	Q3A	Q4E	FY12E	Q1E	Q2E	Q3E	Q4E	FY13E	FY14E
			Feb-12	May-12	Aug-12	Nov-12		Feb-13	May-13	Aug-13	Nov-13		
Cash/Equivalents	\$101	\$68	\$69	\$97	\$173	\$275	\$275	\$349	\$367	\$341	\$334	\$334	\$328
ST Investments	\$13	\$16	\$16	\$15	\$15	\$15	\$15	\$15	\$15	\$15	\$15	\$15	\$15
Accounts Receivable	\$1,029	\$1,143	\$1,023	\$983	\$1,173	\$1,096	\$1,096	\$968	\$956	\$998	\$1,127	\$1,127	\$1,170
Receivable from Vendors	\$139	\$150	\$150	\$130	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Receivable from Affiliates (MITAC)	\$1	\$1	\$2	\$1	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Inventories	\$964	\$975	\$953	\$875	\$901	\$887	\$887	\$834	\$847	\$884	\$911	\$911	\$1,037
Deferred Taxes	\$31	\$28	\$29	\$28	\$28	\$22	\$22	\$25	\$29	\$34	\$28	\$28	\$30
Other Assets	\$72	\$57	\$57	\$50	\$58	\$45	\$45	\$51	\$50	\$65	\$54	\$54	\$59
<b>Total Current Assets</b>	<b>\$2,351</b>	<b>\$2,438</b>	<b>\$2,298</b>	<b>\$2,180</b>	<b>\$2,349</b>	<b>\$2,340</b>	<b>\$2,340</b>	<b>\$2,243</b>	<b>\$2,265</b>	<b>\$2,338</b>	<b>\$2,470</b>	<b>\$2,470</b>	<b>\$2,640</b>
PP&E, net	\$111	\$125	\$126	\$124	\$124	\$128	\$128	\$133	\$138	\$143	\$148	\$148	\$169
Goodwill	\$167	\$185	\$185	\$181	\$184	\$184	\$184	\$184	\$184	\$184	\$184	\$184	\$184
Intangibles	\$46	\$38	\$35	\$33	\$31	\$30	\$30	\$29	\$28	\$27	\$25	\$25	\$21
Deferred Taxes	\$2	\$1	\$1	\$1	\$1	\$0	\$0	\$1	\$1	\$1	\$1	\$1	\$1
Other Assets	\$41	\$46	\$55	\$42	\$42	\$36	\$36	\$50	\$42	\$48	\$44	\$44	\$48
<b>Total Assets</b>	<b>\$2,718</b>	<b>\$2,833</b>	<b>\$2,699</b>	<b>\$2,560</b>	<b>\$2,732</b>	<b>\$2,720</b>	<b>\$2,720</b>	<b>\$2,640</b>	<b>\$2,657</b>	<b>\$2,740</b>	<b>\$2,872</b>	<b>\$2,872</b>	<b>\$3,062</b>
Borrowings (Term & Lines of Credit)	\$304	\$159	\$80	\$205	\$215	\$153	\$153	\$153	\$153	\$153	\$153	\$153	\$153
Payable to Affiliates (MITAC)	\$3	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Accounts Payable	\$923	\$1,036	\$928	\$801	\$909	\$915	\$915	\$834	\$822	\$857	\$940	\$940	\$976
Accrued Liabilities	\$165	\$172	\$163	\$156	\$157	\$168	\$168	\$132	\$141	\$151	\$155	\$155	\$156
Income Tax Payable	\$2	\$5	\$11	\$1	\$3	\$4	\$4	\$10	\$1	\$4	\$5	\$5	\$6
<b>Total Current Liabilities</b>	<b>\$1,397</b>	<b>\$1,372</b>	<b>\$1,183</b>	<b>\$1,163</b>	<b>\$1,284</b>	<b>\$1,240</b>	<b>\$1,240</b>	<b>\$1,129</b>	<b>\$1,116</b>	<b>\$1,164</b>	<b>\$1,253</b>	<b>\$1,253</b>	<b>\$1,290</b>
Long Term Debt	\$84	\$88	\$83	\$85	\$85	\$85	\$85	\$85	\$85	\$85	\$85	\$85	\$85
Convertible Debt	\$132	\$136	\$137	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Deferred Taxes	\$3	\$8	\$9	\$8	\$7	\$6	\$6	\$8	\$8	\$9	\$8	\$8	\$9
Other LT Liabilities	\$56	\$61	\$64	\$58	\$60	\$60	\$60	\$60	\$60	\$60	\$60	\$60	\$60
<b>Total Liabilities</b>	<b>\$1,673</b>	<b>\$1,665</b>	<b>\$1,476</b>	<b>\$1,315</b>	<b>\$1,437</b>	<b>\$1,392</b>	<b>\$1,392</b>	<b>\$1,283</b>	<b>\$1,270</b>	<b>\$1,319</b>	<b>\$1,407</b>	<b>\$1,407</b>	<b>\$1,445</b>
Minority Interest	\$9	\$10	\$11	\$7	\$7	\$6	\$6	\$6	\$6	\$6	\$5	\$5	\$4
Paid in Capital	\$288	\$299	\$321	\$323	\$326	\$326	\$326	\$326	\$326	\$326	\$326	\$326	\$326
Treasury Stock	\$0	\$0	(\$12)	(\$12)	(\$12)	(\$17)	(\$17)	(\$22)	(\$27)	(\$32)	(\$37)	(\$37)	(\$57)
Accum Other Comprehensive Income	\$39	\$30	\$36	\$25	\$36	\$36	\$36	\$36	\$36	\$36	\$36	\$36	\$36
Retained Earning	\$709	\$830	\$868	\$902	\$937	\$976	\$976	\$1,011	\$1,046	\$1,085	\$1,134	\$1,134	\$1,308
<b>Total Shareholders' Equity</b>	<b>\$1,036</b>	<b>\$1,158</b>	<b>\$1,213</b>	<b>\$1,239</b>	<b>\$1,288</b>	<b>\$1,321</b>	<b>\$1,321</b>	<b>\$1,351</b>	<b>\$1,382</b>	<b>\$1,416</b>	<b>\$1,460</b>	<b>\$1,460</b>	<b>\$1,614</b>
<b>Total Liabilities &amp; Equity</b>	<b>\$2,718</b>	<b>\$2,833</b>	<b>\$2,699</b>	<b>\$2,560</b>	<b>\$2,732</b>	<b>\$2,720</b>	<b>\$2,720</b>	<b>\$2,640</b>	<b>\$2,657</b>	<b>\$2,740</b>	<b>\$2,872</b>	<b>\$2,872</b>	<b>\$3,062</b>

**Cash Flow Statement (SNX)**

Fiscal Year Ends November  
Dollars in Thousands

	FY10	FY11	Q1A	Q2E	Q3E	Q4E	FY12E	Q1E	Q2E	Q3E	Q4E	FY13E	FY14E
			Feb-12	May-12	Aug-12	Nov-12		Feb-13	May-13	Aug-13	Nov-13		
Net Income	\$128	\$151	\$39	\$35	\$35	\$39	\$148	\$35	\$36	\$39	\$49	\$158	\$174
Depreciation	\$11	\$17	\$4	\$4	\$4	\$4	\$16	\$4	\$4	\$4	\$4	\$15	\$15
Amortization of Intangibles	\$5	\$8	\$2	\$2	\$1	\$1	\$7	\$1	\$1	\$1	\$1	\$5	\$5
Non-cash stock based compensation	\$9	\$8	\$2	\$2	\$0	\$0	\$4	\$0	\$0	\$0	\$0	\$0	\$0
Provision for Doubtful Accounts	\$7	\$7	\$2	(\$1)	\$0	\$0	\$1	\$0	\$0	\$0	\$0	\$0	\$0
Tax Benefit from Employee Stock Plan	\$2	\$0	(\$0)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Unrealized Gain (Loss)	(\$1)	\$1	(\$1)	\$0	\$0	\$0	(\$1)	\$0	\$0	\$0	\$0	\$0	\$0
Gain (Loss) on Sale of Assets	(\$13)	\$0	\$0	(\$0)	\$0	\$0	(\$0)	\$0	\$0	\$0	\$0	\$0	\$0
Other	\$5	\$5	\$1	\$1	\$2	\$0	\$5	\$0	\$0	\$0	\$0	\$0	\$0
Minority Interest	\$0	\$0	\$0	(\$0)	(\$0)	(\$0)	(\$1)	(\$0)	(\$0)	(\$0)	(\$0)	(\$1)	(\$1)
Receivables	(\$174)	\$33	\$114	\$60	(\$59)	\$76	\$192	\$129	\$12	(\$42)	(\$129)	(\$31)	(\$43)
Inventories	(\$240)	\$28	\$22	\$75	(\$26)	\$14	\$86	\$52	(\$13)	(\$37)	(\$27)	(\$25)	(\$126)
Other Assets	\$1	(\$4)	(\$15)	\$6	(\$8)	\$13	(\$4)	(\$6)	\$1	(\$16)	\$11	(\$9)	(\$5)
Accrued Liabilities	\$12	\$3	(\$10)	(\$13)	\$2	\$11	(\$10)	(\$36)	\$8	\$10	\$5	(\$13)	\$1
Deferred Liabilities	(\$15)	\$13	\$9	\$0	(\$1)	\$6	\$14	(\$2)	(\$3)	(\$5)	\$6	(\$4)	(\$2)
Taxes Payable	\$0	\$0	\$0	\$0	\$2	\$1	\$3	\$6	(\$9)	\$3	\$1	\$1	\$1
Accounts Payable	\$196	(\$51)	(\$96)	(\$123)	\$107	\$6	(\$105)	(\$81)	(\$13)	\$36	\$83	\$25	\$35
<b>Cash Flow from Operations</b>	<b>(\$66)</b>	<b>\$219</b>	<b>\$74</b>	<b>\$48</b>	<b>\$60</b>	<b>\$171</b>	<b>\$353</b>	<b>\$101</b>	<b>\$24</b>	<b>(\$7)</b>	<b>\$3</b>	<b>\$121</b>	<b>\$53</b>
Purchases of ST Investments, Net	\$13	(\$10)	\$1	\$0	(\$0)	\$0	\$1	\$0	\$0	\$0	\$0	\$0	\$0
Acquisitions	(\$47)	(\$60)	(\$0)	(\$0)	\$0	\$0	(\$0)	\$0	\$0	\$0	\$0	\$0	\$0
Other Investments	\$33	(\$2)	\$0	\$4	(\$2)	\$6	\$8	(\$13)	\$8	(\$6)	\$4	(\$7)	(\$4)
Capital Expenditures	(\$13)	(\$40)	(\$55)	(\$3)	(\$8)	(\$8)	(\$22)	(\$9)	(\$9)	(\$9)	(\$9)	(\$35)	(\$35)
Restricted Cash	\$15	(\$14)	\$11	\$2	\$0	\$0	\$12	\$0	\$0	\$0	\$0	\$0	\$0
<b>Cash Flow from Investing</b>	<b>\$1</b>	<b>(\$126)</b>	<b>\$7</b>	<b>\$3</b>	<b>(\$9)</b>	<b>(\$2)</b>	<b>(\$1)</b>	<b>(\$22)</b>	<b>(\$1)</b>	<b>(\$15)</b>	<b>(\$5)</b>	<b>(\$42)</b>	<b>(\$39)</b>
ST Borrowing, Net	\$93	(\$106)	(\$77)	(\$15)	\$10	(\$63)	(\$145)	\$0	\$0	\$0	\$0	\$0	\$0
LT Borrowing, Net	(\$25)	(\$21)	(\$10)	(\$6)	\$2	\$0	(\$14)	\$0	\$0	\$0	\$0	\$0	\$0
Common Stock Issuance and other	\$26	\$12	\$8	(\$4)	\$14	(\$5)	\$12	(\$5)	(\$5)	(\$5)	(\$5)	(\$20)	(\$20)
<b>Cash Flow from Financing</b>	<b>\$94</b>	<b>(\$114)</b>	<b>(\$80)</b>	<b>(\$25)</b>	<b>\$26</b>	<b>(\$68)</b>	<b>(\$147)</b>	<b>(\$5)</b>	<b>(\$5)</b>	<b>(\$5)</b>	<b>(\$5)</b>	<b>(\$20)</b>	<b>(\$20)</b>
Foreign Exchange Impact	(\$0)	\$1	(\$0)	\$2	\$0	\$0	\$2	\$0	\$0	\$0	\$0	\$0	\$0
<b>Net Change in Cash</b>	<b>\$29</b>	<b>(\$20)</b>	<b>\$1</b>	<b>\$28</b>	<b>\$76</b>	<b>\$102</b>	<b>\$207</b>	<b>\$74</b>	<b>\$18</b>	<b>(\$26)</b>	<b>(\$7)</b>	<b>\$59</b>	<b>(\$6)</b>
Beginning Cash	\$59	\$88	\$68	\$69	\$97	\$173	\$68	\$275	\$349	\$367	\$341	\$275	\$334
<b>Ending Cash</b>	<b>\$88</b>	<b>\$68</b>	<b>\$69</b>	<b>\$97</b>	<b>\$173</b>	<b>\$275</b>	<b>\$275</b>	<b>\$349</b>	<b>\$367</b>	<b>\$341</b>	<b>\$334</b>	<b>\$334</b>	<b>\$328</b>

Source: Company report, Citi Research

## Company Focus

- Company Update
- Initiation of Coverage

<b>Neutral</b>	<b>2</b>
Price (05 Oct 12)	US\$7.27
Target price	US\$8.00
Expected share price return	10.0%
Expected dividend yield	2.3%
<b>Expected total return</b>	<b>12.4%</b>
Market Cap	US\$9,503M

### Price Performance (RIC: XRX.N, BB: XRX US)



## Xerox Corp (XRX)

### Low Valuations Warranted Given Macro Concerns and Secular Headwinds In Imaging

- **Stock Call** — We are initiating coverage of Xerox Corp (XRX) with a Neutral rating and a target price of \$8.00. We view the shares to be fairly valued with fairly balanced risk/reward profiles. Our Neutral rating compares with consensus rating distribution of 36% Buy, 55% Hold, and 9% Sell. Unfavorable secular trends (mobility and cloud) coupled with weak macro trends are likely to hamper print demand trends in the near to mid term. Offsetting these negatives is the company's emphasis on higher growth Services business and free cash flow generation.
- **What could make us more positive?** — We would become more constructive on the shares if the following catalysts materialize: 1) overall macro environment and unemployment rates improves, particularly in Europe, 2) checks suggest 4Q12 capex budget flush is occurring, 3) Xerox is able to control operating expenses and drive margin expansion, especially in their Services segment, 4) faster acceleration in the company's services which represent ~50% of the company's total sales.
- **What could make us more negative?** — We may become more negative on the shares if the following occurs: 1) further deterioration of the macro environment and IT demand, 2) significantly constrained 4Q12 enterprise IT capex spend, 3) more aggressive pricing from competitors, 4) further margin pressures in their Services segment and 5) unattractive acquisitions that pose integration challenges and poor return profile.
- **Valuation** — Our target price of \$8 is based on 7x F12-month EPS 12 months from now. During the past five years, Xerox shares have traded in a range of 5-14x F12 non-GAAP EPS with a median of 9x. We are using a target multiple of 7x, toward the lower end of this historical range and in line with the company's current valuation multiple due to the current macro backdrop and the long-term secular headwinds facing the imaging industry resulting in flattish earnings growth, but partially offset by continued positive FCF generation over the next three years. Xerox's shares currently trade at 6.5x F12M EPS estimates and we are not forecasting any material upside to consensus estimates or multiple expansion. Our Neutral stock rating is generally inline with consensus (36% buy, 55% hold, 9% sell).

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
2011A	0.23A	0.27A	0.26A	0.33A	1.08A	1.08A
2012E	0.23A	0.26A	0.25E	0.32E	1.06E	1.08E
Previous	na	na	na	na	na	na
2013E	0.25E	0.26E	0.26E	0.33E	1.10E	1.17E
Previous	na	na	na	na	na	na
2014E	0.25E	0.26E	0.27E	0.33E	1.11E	1.27E
Previous	na	na	na	na	na	na

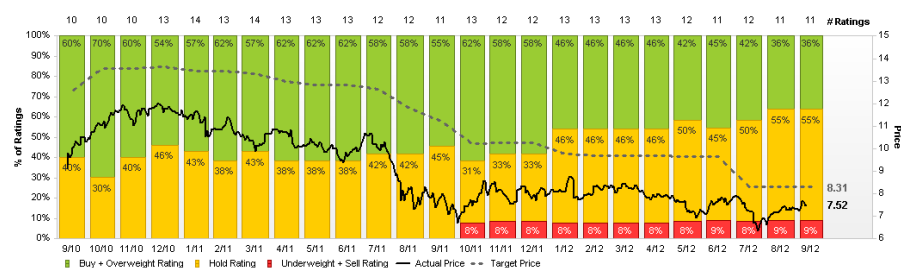
Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

## Recent Results and Outlook

In 2Q12, Xerox reported results of \$5.54B (-1% YoY, +1% q/q). EPS of \$0.26 were in line with expectations. Technology revenues (which includes the sale of document systems, supplies and financing) which comprise 43% of total revenues were down 7% y/y (-4% in constant currency terms) while service revenues (51% of total) grew 5% y/y (7% in constant currency terms). Gross margins came in at 32% (down 140 bps) from a year ago but up 100 bps q/. Operating margin of 9.7% was down 70 bps from second-quarter 2011, and up 120 points from Q1, driven by sequential improvements from the company's services business.

Management did not provide quarterly guidance but did revise down its full year EPS outlook, given continued macro weakness in EMEA which impacts Technology segment revenues. Overall now the company expects to generate \$1.07-\$1.12 in non GAAP EPS (vs prior guidance \$1.12-1.18 and FactSet \$1.11). On the positive side, management still expects to generate \$2-\$2.3Bn in operating cash flow during the year.

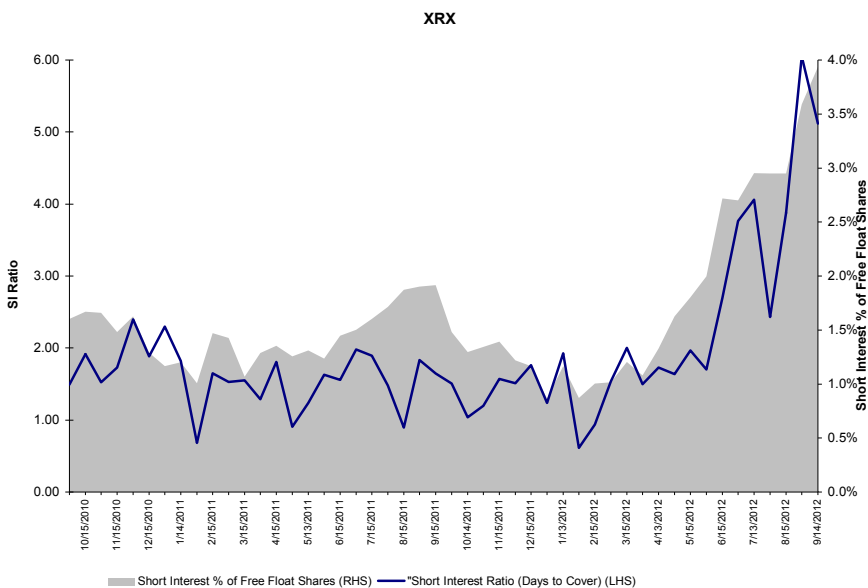
Figure 1. XRX Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Xerox short interest is at multi year high levels potentially setting up for a boost of the stock on any positive company news.

Figure 2. XRX Short Interest Analysis



Source: FactSet and Citi Research

Figure 3. XRX Income Statement (Detailed Model Available Upon Request)

Income Statement Fiscal Year Ends December Dollars in Millions	2010 FYA	2011 FYA	1QA Mar-12	2QA Jun-12	3QE Sep-12	4QE Dec-12	2012 FYE	1QE Mar-13	2QE Jun-13	3QE Sep-13	4QE Dec-13	2013 FYE	2014 FYE
<b>Equipment Sales</b>	3,857	3,856	811	846	845	1,029	3,531	772	846	846	1,064	3,527	3,349
% of total revenue	18%	17%	15%	15%	15%	17%	16%	14%	15%	15%	18%	15%	15%
% chg yr to yr	9%	0%	-2%	-9%	-10%	-12%	-8%	-5%	0%	0%	3%	0%	-5%
% chg qtr to qtr	-	-	-31%	4%	0%	22%	-	-25%	10%	0%	26%	-	-
<b>Supplies, Paper &amp; Other Sales</b>	3,377	3,270	777	789	733	785	3,083	753	753	672	725	2,903	2,588
% of total revenue	16%	14%	14%	14%	13%	13%	14%	14%	13%	12%	12%	13%	11%
% chg yr to yr	9%	-3%	-8%	-1%	-8%	-5%	-6%	-3%	-5%	-8%	-8%	-6%	-11%
% chg qtr to qtr	-	-	-6%	2%	-7%	7%	-	-4%	0%	-11%	8%	-	-
<b>Total Product Sales</b>	7,234	7,126	1,588	1,635	1,577	1,813	6,614	1,525	1,599	1,518	1,788	6,430	5,937
% of total revenue	33%	31%	29%	30%	28%	31%	29%	28%	28%	27%	30%	28%	26%
% chg yr to yr	9%	-1%	-5%	-5%	-9%	-9%	-7%	-4%	-2%	-4%	-1%	-3%	-8%
% chg qtr to qtr	-	-	-20%	3%	-4%	15%	-	-16%	5%	-5%	18%	-	-
<b>Service, Outsourcing &amp; Equipment Rentals</b>	13,739	14,868	3,767	3,763	3,822	3,944	15,296	3,836	3,909	3,959	4,108	15,812	16,300
% of total revenue	63.5%	65.7%	68.5%	67.9%	69.0%	66.8%	68.0%	69.8%	69.2%	70.5%	68.1%	69.4%	71.6%
% chg yr to yr	75.7%	8.2%	3.7%	0.9%	3.6%	3.4%	2.9%	1.8%	3.9%	3.6%	4.1%	3.4%	3.1%
% chg qtr to qtr	-	-	-1.3%	-0.1%	1.6%	3.2%	-	-2.8%	1.9%	1.3%	3.7%	-	-
<b>Financing</b>	660	632	148	143	143	143	577	139	139	139	139	555	515
% of total revenue	3.1%	2.8%	2.7%	2.6%	2.6%	2.4%	2.6%	2.5%	2.5%	2.5%	2.3%	2.4%	2.3%
% chg yr to yr	-7.4%	-4.2%	-8.6%	-12.3%	-8.3%	-5.3%	-8.7%	-6.3%	-3.0%	-3.0%	-3.0%	-3.8%	-7.1%
% chg qtr to qtr	-	-	-2.0%	-3.4%	0.0%	0.0%	-	-3.0%	0.0%	0.0%	0.0%	-	-
<b>Revenue</b>	<b>\$21,633</b>	<b>\$22,626</b>	<b>\$5,503</b>	<b>\$5,541</b>	<b>\$5,543</b>	<b>\$5,901</b>	<b>\$22,487</b>	<b>\$5,499</b>	<b>\$5,647</b>	<b>\$5,616</b>	<b>\$6,034</b>	<b>\$22,797</b>	<b>\$22,752</b>
<b>Gross Profit</b>	<b>\$7,451</b>	<b>\$7,429</b>	<b>\$1,708</b>	<b>\$1,773</b>	<b>\$1,758</b>	<b>\$1,894</b>	<b>\$7,133</b>	<b>\$1,718</b>	<b>\$1,765</b>	<b>\$1,765</b>	<b>\$1,913</b>	<b>\$7,161</b>	<b>\$7,124</b>
SG&A	\$4,406	\$4,325	\$1,044	\$1,045	\$1,058	\$1,075	\$4,222	\$1,048	\$1,082	\$1,069	\$1,097	\$4,294	\$4,279
Bad Debt Expense	\$188	\$157	\$24	\$31	\$31	\$31	\$117	\$30	\$30	\$30	\$30	\$120	\$100
RD&E (incl sustaining engineering)	\$781	\$721	\$173	\$161	\$174	\$170	\$678	\$176	\$164	\$177	\$173	\$691	\$705
Total Operating Expense	\$5,375	\$5,203	\$1,241	\$1,237	\$1,263	\$1,276	\$5,017	\$1,254	\$1,276	\$1,276	\$1,300	\$5,106	\$5,084
<b>Operating Income</b>	<b>\$2,076</b>	<b>\$2,226</b>	<b>\$467</b>	<b>\$536</b>	<b>\$495</b>	<b>\$618</b>	<b>\$2,117</b>	<b>\$464</b>	<b>\$489</b>	<b>\$489</b>	<b>\$613</b>	<b>\$2,055</b>	<b>\$2,040</b>
Depr and Amort	\$1,097	\$1,251	\$313	\$313	\$313	\$313	\$1,252	\$313	\$313	\$313	\$313	\$1,252	\$1,252
<b>EBITDA</b>	<b>\$3,173</b>	<b>\$3,477</b>	<b>\$780</b>	<b>\$849</b>	<b>\$808</b>	<b>\$931</b>	<b>\$3,369</b>	<b>\$777</b>	<b>\$802</b>	<b>\$802</b>	<b>\$926</b>	<b>\$3,307</b>	<b>\$3,292</b>
Non-Financing Interest Expense	\$346	\$247	\$56	\$58	\$57	\$57	\$229	\$55	\$55	\$55	\$55	\$220	\$220
Interest Income	(\$19)	(\$21)	(\$3)	(\$4)	(\$4)	(\$4)	(\$15)	(\$9)	(\$6)	(\$7)	(\$9)	(\$31)	(\$58)
Currency Losses (Gains)	(\$10)	\$12	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Amort of Goodwill & Intangibles	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Restructuring Charge	\$0	\$61	\$17	\$29	\$0	\$0	\$46	\$0	\$0	\$0	\$0	\$0	\$0
Curtailment Gain	\$0	(\$107)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Other Expense	\$0	\$38	\$2	\$20	\$0	\$0	\$22	\$0	\$0	\$0	\$0	\$0	\$0
<b>Non-GAAP Pretax Income</b>	<b>\$1,759</b>	<b>\$1,996</b>	<b>\$395</b>	<b>\$433</b>	<b>\$442</b>	<b>\$565</b>	<b>\$1,835</b>	<b>\$417</b>	<b>\$440</b>	<b>\$441</b>	<b>\$567</b>	<b>\$1,866</b>	<b>\$1,877</b>
Provision for Income Taxes	\$548	\$549	\$109	\$97	\$128	\$164	\$498	\$121	\$128	\$128	\$164	\$541	\$544
Effective Tax Rate	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Equity in Net Income of Unconsolidated Affiliates	\$116	\$149	\$40	\$31	\$31	\$31	\$133	\$31	\$31	\$31	\$31	\$124	\$124
Portion of Income Attributable to Non-Controlling Interests	(\$31)	(\$33)	(\$7)	(\$7)	(\$7)	(\$7)	(\$28)	(\$7)	(\$7)	(\$8)	(\$8)	(\$30)	(\$32)
Other	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Preferred Dividends	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<b>Non-GAAP Net Income</b>	<b>\$1,297</b>	<b>\$1,563</b>	<b>\$319</b>	<b>\$360</b>	<b>\$338</b>	<b>\$425</b>	<b>\$1,442</b>	<b>\$320</b>	<b>\$337</b>	<b>\$336</b>	<b>\$426</b>	<b>\$1,419</b>	<b>\$1,425</b>
GAAP Net Income	\$607	\$1,295	\$269	\$309	\$287	\$375	\$1,240	\$270	\$286	\$285	\$375	\$1,215	\$1,222
Non-GAAP Basic EPS	\$0.97	\$1.13	\$0.24	\$0.27	\$0.26	\$0.34	\$1.11	\$0.26	\$0.27	\$0.27	\$0.35	\$1.16	\$1.16
<b>Non-GAAP Diluted EPS</b>	<b>\$0.94</b>	<b>\$1.08</b>	<b>\$0.23</b>	<b>\$0.26</b>	<b>\$0.25</b>	<b>\$0.32</b>	<b>\$1.06</b>	<b>\$0.25</b>	<b>\$0.26</b>	<b>\$0.26</b>	<b>\$0.33</b>	<b>\$1.10</b>	<b>\$1.11</b>
GAAP Basic EPS	\$0.44	\$0.92	\$0.20	\$0.23	\$0.22	\$0.29	\$0.93	\$0.21	\$0.23	\$0.23	\$0.30	\$0.97	\$0.98
GAAP Diluted EPS	\$0.43	\$0.90	\$0.19	\$0.22	\$0.21	\$0.29	\$0.91	\$0.21	\$0.22	\$0.22	\$0.29	\$0.95	\$0.95
F12 EPS				\$1.08	\$1.08	\$1.10		\$1.10	\$1.11	\$1.11	\$1.11		
Non-GAAP Basic Shares Outstanding	1,335	1,388	1,337	1,334	1,297	1,253	1,305	1,226	1,226	1,226	1,226	1,226	1,226
Non GAAP - Diluted Shares Outstanding	1,374	1,444	1,396	1,393	1,356	1,312	1,364	1,285	1,285	1,285	1,285	1,285	1,285
<b>Percent of Revenue</b>													
Gross Margin	34%	33%	31%	32%	32%	32%	32%	31%	31%	31%	32%	31%	31%
RD&E	4%	3%	3%	3%	3%	3%	3%	3%	3%	3%	3%	3%	3%
SG&A	21%	20%	19%	19%	20%	19%	19%	20%	20%	20%	19%	19%	19%
Total Operating Expense	25%	23%	23%	22%	23%	22%	22%	23%	23%	23%	22%	22%	22%
Operating Income	10%	10%	8%	10%	9%	10%	9%	8%	9%	9%	10%	9%	9%
Non-GAAP Net Income	6%	7%	6%	6%	6%	7%	6%	6%	6%	6%	7%	6%	6%
<b>% Change Year to Year</b>													
Revenue	43%	5%	1%	-1%	-1%	-1%	-1%	0%	2%	1%	2%	1%	0%
Revenue (Constant Currency)	0%	0%	2%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%
Cost of Sales	55%	7%	4%	1%	1%	-1%	1%	0%	3%	2%	3%	2%	0%
RD&E	-7%	-8%	-6%	-8%	-5%	-5%	-6%	2%	2%	2%	2%	2%	2%
SG&A	15%	-2%	-3%	-4%	-1%	-2%	-2%	0%	4%	1%	2%	2%	0%
Total Operating Expense	8%	-3%	-4%	-4%	-2%	-4%	-4%	1%	3%	1%	2%	2%	0%
Operating Income	100%	7%	-9%	-8%	-8%	4%	-5%	-1%	-9%	-1%	-1%	-3%	-1%
Non-GAAP Net Income	146%	21%	-4%	-8%	-10%	-8%	-8%	0%	-7%	0%	0%	-2%	0%
Non-GAAP Diluted EPS	58%	15%	0%	-3%	-3%	-1%	-2%	9%	1%	5%	2%	4%	0%
Dividend per share	\$0.17	\$0.17	\$0.04	\$0.04	\$0.04	\$0.04	\$0.17	\$0.04	\$0.04	\$0.04	\$0.04	\$0.17	\$0.17

Source: Company report, Citi Research

Figure 4. XRX Balance Sheet and Cash Flow Statement

Balance Sheet (XRX)		2010	2011	2012				2012	2013				2013	2014
Fiscal Year Ends December		FYA	FYA	1QA	2QA	3QE	4QE	FYA	1QE	2QE	3QE	4QE	FYA	FYA
Dollars in Millions				Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
Cash & Equivalents		\$1,211	\$902	\$1,514	\$814	\$873	\$1,721	\$1,721	\$1,275	\$1,414	\$1,712	\$3,033	\$3,033	\$4,413
Short-term Investments		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Trade Accounts Receivable		\$2,826	\$2,600	\$2,909	\$2,776	\$2,979	\$2,572	\$2,572	\$2,907	\$2,829	\$3,019	\$2,631	\$2,631	\$2,628
Financing Receivable (ST)		\$2,485	\$2,331	\$2,294	\$2,136	\$2,136	\$2,136	\$2,136	\$2,111	\$2,111	\$2,111	\$2,111	\$2,111	\$2,111
Inventory		\$991	\$1,021	\$1,065	\$1,073	\$1,200	\$1,010	\$1,010	\$1,064	\$1,064	\$1,216	\$1,033	\$1,033	\$1,032
Deferred Income Tax, Other Assets		\$1,126	\$1,058	\$1,100	\$1,213	\$1,051	\$1,101	\$1,101	\$1,092	\$1,092	\$1,038	\$1,092	\$1,092	\$1,069
<b>Total Current Assets</b>		<b>\$8,639</b>	<b>\$7,912</b>	<b>\$8,882</b>	<b>\$8,012</b>	<b>\$8,240</b>	<b>\$8,541</b>	<b>\$8,541</b>	<b>\$8,450</b>	<b>\$8,511</b>	<b>\$9,096</b>	<b>\$9,901</b>	<b>\$9,901</b>	<b>\$11,253</b>
Financing Receivables (Long-Term)		\$4,135	\$4,031	\$3,976	\$3,780	\$3,780	\$3,780	\$3,780	\$3,780	\$3,780	\$3,780	\$3,780	\$3,780	\$3,780
Equipment on Operating Leases		\$530	\$533	\$536	\$519	\$519	\$519	\$519	\$519	\$519	\$519	\$519	\$519	\$504
PP&E, net		\$1,671	\$1,612	\$1,603	\$1,553	\$1,522	\$1,490	\$1,490	\$1,459	\$1,427	\$1,396	\$1,364	\$1,364	\$1,238
Investments in Affiliates		\$1,291	\$1,395	\$1,338	\$1,367	\$1,367	\$1,367	\$1,367	\$1,367	\$1,367	\$1,367	\$1,367	\$1,367	\$1,367
Intangible and Other		\$3,371	\$3,042	\$2,989	\$2,904	\$2,748	\$2,591	\$2,591	\$2,435	\$2,278	\$2,122	\$1,965	\$1,965	\$1,339
Goodwill (net of acc. Amortization)		\$8,649	\$8,803	\$8,918	\$8,848	\$8,848	\$8,848	\$8,848	\$8,848	\$8,848	\$8,848	\$8,848	\$8,848	\$8,848
Deferred Income Tax (Long-Term)		\$540	\$672	\$638	\$598	\$598	\$598	\$598	\$598	\$598	\$598	\$598	\$598	\$598
Other Long-Term Assets		\$1,774	\$2,116	\$2,271	\$2,260	\$2,260	\$2,260	\$2,260	\$2,260	\$2,260	\$2,260	\$2,260	\$2,260	\$2,260
<b>Total Assets</b>		<b>\$30,600</b>	<b>\$30,116</b>	<b>\$31,151</b>	<b>\$29,841</b>	<b>\$29,881</b>	<b>\$29,994</b>	<b>\$29,994</b>	<b>\$29,715</b>	<b>\$29,588</b>	<b>\$29,985</b>	<b>\$30,602</b>	<b>\$30,602</b>	<b>\$31,202</b>
Short-term Debt		\$1,370	\$1,545	\$1,145	\$1,099	\$1,099	\$1,099	\$1,099	\$1,099	\$1,099	\$1,099	\$1,099	\$1,099	\$1,099
Accounts Payable		\$1,968	\$2,016	\$1,758	\$1,712	\$1,825	\$1,999	\$1,999	\$1,752	\$1,764	\$1,857	\$2,056	\$2,056	\$2,060
Accrued Comp and Benefit Cost		\$901	\$757	\$794	\$675	\$695	\$788	\$788	\$789	\$615	\$686	\$782	\$782	\$765
Unearned Income		\$0	\$432	\$407	\$404	\$404	\$404	\$404	\$404	\$404	\$404	\$404	\$404	\$404
Other Current Liabilities		\$2,178	\$1,631	\$1,691	\$1,492	\$1,492	\$1,492	\$1,492	\$1,442	\$1,442	\$1,442	\$1,442	\$1,442	\$1,442
<b>Total Current Liabilities</b>		<b>\$6,417</b>	<b>\$6,381</b>	<b>\$5,795</b>	<b>\$5,382</b>	<b>\$5,515</b>	<b>\$5,782</b>	<b>\$5,782</b>	<b>\$5,485</b>	<b>\$5,324</b>	<b>\$5,489</b>	<b>\$5,783</b>	<b>\$5,783</b>	<b>\$5,770</b>
Long-term Debt		\$7,237	\$7,088	\$8,483	\$8,061	\$8,061	\$8,061	\$8,061	\$8,061	\$8,061	\$8,061	\$8,061	\$8,061	\$8,061
Pension and Benefit Liabilities		\$2,071	\$2,487	\$2,369	\$2,194	\$2,119	\$2,044	\$2,044	\$1,844	\$1,644	\$1,644	\$1,644	\$1,644	\$1,244
Post Retirement Medical		\$920	\$925	\$930	\$916	\$916	\$916	\$916	\$916	\$916	\$916	\$916	\$916	\$916
Deferred Taxes and Other Liabilities		\$1,447	\$861	\$834	\$793	\$793	\$793	\$793	\$793	\$793	\$793	\$793	\$793	\$793
<b>Total Liabilities</b>		<b>\$18,092</b>	<b>\$17,742</b>	<b>\$18,411</b>	<b>\$17,346</b>	<b>\$17,404</b>	<b>\$17,596</b>	<b>\$17,596</b>	<b>\$17,099</b>	<b>\$16,738</b>	<b>\$16,903</b>	<b>\$17,197</b>	<b>\$17,197</b>	<b>\$16,784</b>
Def'd ESOP Benefits		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Minorities Interests		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<b>Shareholders Equity</b>		<b>\$12,508</b>	<b>\$12,374</b>	<b>\$12,740</b>	<b>\$12,495</b>	<b>\$12,477</b>	<b>\$12,398</b>	<b>\$12,398</b>	<b>\$12,616</b>	<b>\$12,849</b>	<b>\$13,082</b>	<b>\$13,405</b>	<b>\$13,405</b>	<b>\$14,418</b>
<b>Total Liabilities &amp; Equity</b>		<b>\$30,600</b>	<b>\$30,116</b>	<b>\$31,151</b>	<b>\$29,841</b>	<b>\$29,881</b>	<b>\$29,994</b>	<b>\$29,994</b>	<b>\$29,715</b>	<b>\$29,588</b>	<b>\$29,985</b>	<b>\$30,602</b>	<b>\$30,602</b>	<b>\$31,202</b>
<b>Cashflow Statement (XRX)</b>		<b>2010</b>	<b>2011</b>	<b>2012</b>				<b>2012</b>	<b>2013</b>				<b>2013</b>	<b>2014</b>
Fiscal Year Ends December		FYA	FYA	1QA	2QA	3QE	4QE	FYE	1QE	2QE	3QE	4QE	FYE	FYE
Dollars in Millions				Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
Net Income (Loss)		637	1328	276	316	294	382	1268	277	293	293	383	1245	1254
Depreciation and Amortization		1097	1251	313	313	313	313	1252	313	313	313	313	1252	1252
Provision of Doubtful Acct (receivable + invent)		211	193	37	40	0	0	77	0	0	0	0	0	0
Gain on Sale of Assets		-18	-9	-1	-2	0	0	-3	0	0	0	0	0	0
Undistributed Equity		-37	-86	-31	-4	0	0	-35	0	0	0	0	0	0
Stock-based Compensation		123	123	31	31	0	0	62	0	0	0	0	0	0
Non-Cash Charges (Restructuring, Asset Imp)		483	-74	17	29	0	0	46	0	0	0	0	0	0
Cash Restructuring Costs		-213	-218	-39	-44	0	0	-83	0	0	0	0	0	0
Contribution to Pension		-237	-426	-79	-158	-75	-75	-387	-200	-200	0	0	-400	-400
Inventories		-151	-124	-34	-50	-127	190	-21	-54	0	-152	183	-23	1
Operating-Lease Equipment		-288	-298	-67	-68	0	0	-135	0	0	0	0	0	0
Finance Receivables		129	75	164	111	0	0	275	0	0	0	0	0	0
Accounts Receivable (incl. billed finance receiv)		100	99	-356	4	-203	407	-148	-310	78	-190	388	-33	3
Accounts Payable, Accrued Compensation		615	82	-144	-93	133	267	163	-247	-161	164	294	51	-13
Net Change in Current and Deferred Taxes		227	292	43	18	162	-50	173	9	0	54	-54	9	23
Change in Other Liabilities		58	-107	-14	-157	0	0	-171	0	0	0	0	0	0
Others		-10	-140	-131	-58	0	0	-189	-50	0	0	0	-50	0
<b>Cash Flows from Operations</b>		<b>2726</b>	<b>1961</b>	<b>-15</b>	<b>228</b>	<b>496</b>	<b>1434</b>	<b>2143</b>	<b>-262</b>	<b>323</b>	<b>483</b>	<b>1507</b>	<b>2051</b>	<b>2120</b>
Change in Short-term Investments		0	0	0	0	0	0	0	0	0	0	0	0	0
Capex		-340	-338	-91	-82	-88	-88	-348	-88	-88	-88	-88	-350	-350
Cost of Additions to Internal Use Software		-164	-163	-37	-33	-38	-38	-145	-38	-38	-38	-38	-150	-150
Proceeds from Sale of Assets		37	28	4	3	0	0	7	0	0	0	0	0	0
Acquisitions, Proceeds from Divestitures		-1734	-212	-87	0	0	0	-87	0	0	0	0	0	0
Others		23	10	-3	14	0	0	11	0	0	0	0	0	0
<b>Cash Flows from Investing</b>		<b>-2178</b>	<b>-675</b>	<b>-214</b>	<b>-98</b>	<b>-125</b>	<b>-125</b>	<b>-562</b>	<b>-125</b>	<b>-125</b>	<b>-125</b>	<b>-125</b>	<b>-500</b>	<b>-500</b>
Change in Debt (incl. Secured Financing)		-3056	-621	998	-455	0	0	543	0	0	0	0	0	0
Dividends on Common and Preferred		-230	-265	-63	-63	-55	-53	-234	-52	-52	-52	-52	-208	-208
Issue and Redemption of Common, Pfd, Conv		180	32	7	3	0	0	10	0	0	0	0	0	0
Stock Repurchase, Proceeds from Sale of Sto		-12	-322	-50	-308	-250	-400	-1008	0	0	0	0	0	0
Dividends to Minority Shareholders		0	-392	0	0	0	0	0	0	0	0	0	0	0
Other		2	-18	-57	-4	0	0	-61	0	0	0	0	0	0
<b>Cash Flows from Financing</b>		<b>-3116</b>	<b>-1586</b>	<b>835</b>	<b>-827</b>	<b>-305</b>	<b>-453</b>	<b>-750</b>	<b>-52</b>	<b>-52</b>	<b>-52</b>	<b>-52</b>	<b>-208</b>	<b>-208</b>
Currency Translation Impact		-20	-9	6	-3	0	0	3	0	0	0	0	0	0
<b>Net Change in Cash</b>		<b>-2588</b>	<b>-309</b>	<b>612</b>	<b>-700</b>	<b>66</b>	<b>855</b>	<b>833</b>	<b>-439</b>	<b>146</b>	<b>306</b>	<b>1330</b>	<b>1342</b>	<b>1412</b>
Beginning Cash Balance		3793	1205	896	1508	808	874	896	1729	1291	1436	1742	1729	3072
<b>Ending Cash Balance (incl. mkt securities)</b>		<b>1205</b>	<b>896</b>	<b>1508</b>	<b>808</b>	<b>874</b>	<b>1729</b>	<b>1729</b>	<b>1291</b>	<b>1436</b>	<b>1742</b>	<b>3072</b>	<b>3072</b>	<b>4483</b>

Source: Company report, Citi Research

## Company Focus

- Company Update
- Initiation of Coverage

<b>Sell</b>	<b>3</b>
Price (05 Oct 12)	US\$21.55
Target price	US\$18.00
Expected share price return	-16.5%
Expected dividend yield	5.6%
<b>Expected total return</b>	<b>-10.9%</b>
Market Cap	US\$1,515M

### Price Performance (RIC: LXX.N, BB: LXX US)



## Lexmark International Inc (LXK)

### Low Valuations Warranted Given Difficult Transition Ahead as Company Exits Inkjet Business

- **Stock Call** — We are initiating on Lexmark shares with a Sell rating and a \$18 target price as we continue to have concerns about the company's ability to grow revenue and operating income over the medium to long term given unfavorable secular demand trends (mobility and cloud) coupled with weak macro trends which are likely to hamper print demand trends. While the company's recent announcement to restructure their businesses by exiting the inkjet business is a positive longer term, we believe near to mid term fundamentals remain challenged and we expect the road to recovery from recent restructuring to be a painful one. We expect estimates to come lower over time as the exit of the inkjet business is factored in.
- **Key Reasons For our Sell Rating** — 1) We believe consensus EPS estimates are too high and we are factoring in the removal of the inkjet business which consensus has not yet factored in. 2) Lexmark's future print hardware growth is highly tied to laser print market growth where it suffers a serious scale disadvantage to competitors (HP, Samsung, Canon and Brother) which combined have 70% market share 3) Lexmark's software solutions business represents just 5% of the business with negative profitability during the forecasted period.
- **Where We Could Be Wrong** — 1) Macro impact to print demand is less than anticipated 2) Competition from HP, Samsung and others may not be as intense as we expect. 3) Profitability in the software segment improves dramatically.
- **Cash Flow & Liquidity** — While we have a Sell rating on Lexmark, we do not believe the company will experience cash flow or liquidity constraints. Our Sell rating is simply based on our belief that consensus estimates are materially too high given secular headwinds in the print industry and the road to recovery from the recent restructuring efforts will be a painful one.
- **Valuation** — Our target price of \$18 is based on 5x F12-month EPS. During the past five years Lexmark shares have traded in a range of 5-17x F12 non- GAAP EPS with a median of 8.5x. We are using a target multiple of 5x, toward the lower end of this historical range due to the current macro backdrop, the long-term secular headwinds facing the imaging industry, weak competitive positioning and potential for declining earnings longer term. Our target multiple of 5x is mainly based on our below-consensus EPS estimates (as consensus has not adjusted for the exit of the inkjet business). Our Sell rating compares with consensus ratings distribution of 8% buy, 42% hold, 50% sell.

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
2011A	1.14A	1.36A	0.95A	1.25A	4.70A	4.71A
2012E	1.05A	0.89A	0.81E	0.84E	3.60E	3.73E
Previous	na	na	na	na	na	na
2013E	0.87E	0.99E	0.77E	0.82E	3.46E	3.94E
Previous	na	na	na	na	na	na
2014E	0.86E	1.03E	0.76E	0.93E	3.58E	3.57E
Previous	na	na	na	na	na	na

Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

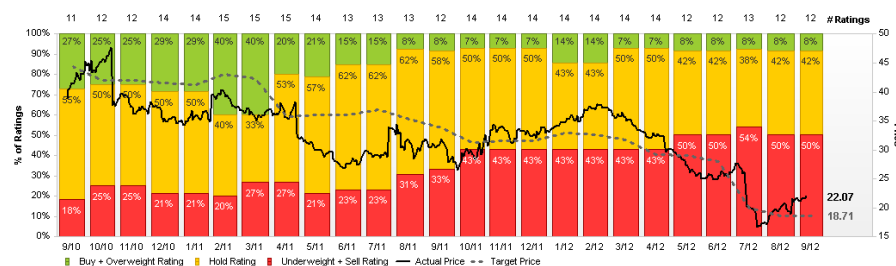


## Recent Results and Outlook

Lexmark reported revenues of \$919M (-12% y/y, -7% q/q) and non GAAP EPS of \$0.89 (-35% y/y) was in line with their negative preannouncement). Revenue and EPS shortfall relative to their prior guide (-7% to -9% y/y decline in revenues and \$0.95-\$1.05 in EPS) was attributed to currency headwinds, secular declines in their inkjet business as well as weak macro conditions in Europe. While gross margins saw a positive mix shift to higher margin software business (up +110 bps q/q, +50 bps y/y), higher investments in operating expenses saw operating income deteriorate to 10.1% (down 90 bps q/q and down 410 bps y/y).

For 3Q, management guided revenues to decline by -9% to -11% y/y, implying revenues of \$921-\$941M. This compared with prior Street expectations of \$962M, while non GAAP EPS was guided to \$0.75-\$0.85 vs prior Street expectations of \$0.98. Operating margins are guided to decline further. For 2012, management guided for revenues to decline by 8 to 10% y/y, including a 3% negative impact from currency. Operating Income margins are guided to be in the 9-10% range with full year EPS of \$3.70-\$3.90, reflective of the currency headwinds and weakened demand environment for the remainder of 2012. Lexmark recently announced restructuring actions associated with exiting the inkjet business and related supplies, as well as \$100M share repurchase during 3Q and 4Q 2012. The restructuring actions will likely complete by 2015 (including closing down facilities) and are expected to result in annualized savings of \$85M in 2013 and increasing to \$95M by 2014. Note our model does reflect the sale of the inkjet business.

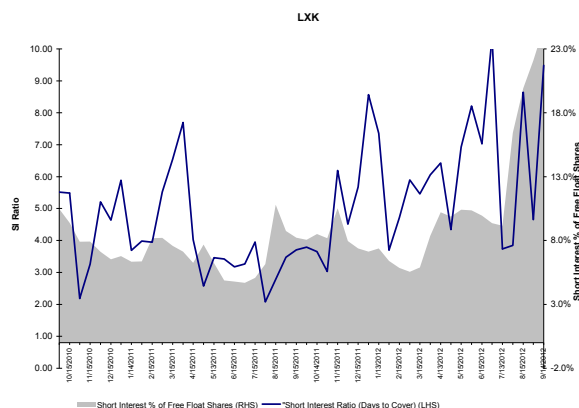
Figure 1. LXX Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

We note LXX short interest is high which could cause a short covering rally on any good news.

Figure 2. LXX Short Interest Analysis



Source: FactSet and Citi Research



Figure 3. Lexmark Income Statement (detailed model available upon request)

Income Statement Fiscal Year Ends December Dollars in Millions	2010 FYA	2011 FYA	2012 1QA Mar-12	2012 2Q Jun-12	2012 3QE Sep-12	2012 4QE Dec-12	2012 FYE	2013 1QE Mar-13	2013 2QE Jun-13	2013 3QE Sep-13	2013 4QE Dec-13	2013 FYE	2014 FYE
<b>Total Inkjet Revenue</b>	<b>1156</b>	<b>938</b>	<b>214</b>	<b>181</b>	<b>154</b>	<b>123</b>	<b>671</b>	<b>92</b>	<b>65</b>	<b>32</b>	<b>0</b>	<b>189</b>	<b>0</b>
% of total revenue	27%	22%	22%	20%	17%	14%	18%	11%	8%	4%	0%	6%	0%
% chg yr to yr	-8%	-19%	-18%	-20%	-33%	-44%	-28%	-57%	-64%	-79%	-100%	-72%	-
% chg qtr to qtr	-	-	-3%	-15%	-15%	-20%	-	-25%	-30%	-50%	-100%	-	-
<b>Total Laser Revenue</b>	<b>2813</b>	<b>2966</b>	<b>704</b>	<b>651</b>	<b>658</b>	<b>685</b>	<b>2698</b>	<b>633</b>	<b>636</b>	<b>612</b>	<b>650</b>	<b>2531</b>	<b>2521</b>
% of total revenue	67%	71%	71%	71%	73%	76%	73%	77%	81%	84%	88%	82%	87%
% chg yr to yr	16%	5%	0%	-13%	-11%	-12%	-9%	-10%	-2%	-7%	-5%	-6%	0%
% chg qtr to qtr	-	-	-	-7%	1%	4%	-	-	0%	-4%	6%	-	-
<b>Perceptive Revenue</b>	<b>48</b>	<b>100</b>	<b>30</b>	<b>44</b>	<b>44</b>	<b>51</b>	<b>169</b>	<b>51</b>	<b>49</b>	<b>49</b>	<b>57</b>	<b>206</b>	<b>237</b>
% of total revenue	1%	2%	3%	5%	5%	6%	5%	6%	6%	7%	8%	7%	8%
% chg yr to yr	-	110%	43%	76%	91%	66%	69%	71%	11%	11%	11%	22%	15%
% chg qtr to qtr	-	-	-	47%	0%	17%	-	0%	-5%	0%	17%	-	-
<b>Other Revenue</b>	<b>193</b>	<b>174</b>	<b>45</b>	<b>43</b>	<b>43</b>	<b>38</b>	<b>169</b>	<b>44</b>	<b>39</b>	<b>39</b>	<b>34</b>	<b>155</b>	<b>140</b>
% total revenue	5%	4%	5%	5%	5%	4%	5%	5%	5%	5%	5%	5%	5%
% chg yr to yr	-5%	-10%	-9%	-9%	-2%	14%	-3%	-3%	-10%	-10%	-10%	-8%	-10%
% chg qtr to qtr	-	-	38%	-5%	0%	-13%	-	17%	-12%	0%	-13%	-	-
<b>Revenue</b>	<b>4,211</b>	<b>4,179</b>	<b>993</b>	<b>919</b>	<b>898</b>	<b>897</b>	<b>3,707</b>	<b>821</b>	<b>788</b>	<b>732</b>	<b>741</b>	<b>3,081</b>	<b>2,897</b>
% chg qtr to qtr	-	-	-6%	-7%	-2%	0%	-	-9%	-4%	-7%	1%	-	-
Cost of Sales	2,652	2,573	602	546	546	544	2,238	479	448	422	430	1,778	1,639
<b>Gross Profit</b>	<b>1,559</b>	<b>1,606</b>	<b>391</b>	<b>373</b>	<b>353</b>	<b>353</b>	<b>1,469</b>	<b>342</b>	<b>340</b>	<b>310</b>	<b>311</b>	<b>1,303</b>	<b>1,258</b>
R&D	369	375	97	94	90	93	374	88	85	81	84	338	341
SG&A	648	705	179	179	174	171	703	168	159	154	147	627	592
Amort of Goodwill & Intangibles	-	-	-	-	-	-	-	-	-	-	-	-	-
Options Expense	24	24	6	7	6	6	25	6	6	6	6	24	24
Total Operating Expense	1,042	1,104	282	280	270	271	1,102	261	250	240	238	989	957
<b>Operating Income</b>	<b>518</b>	<b>503</b>	<b>109</b>	<b>93</b>	<b>83</b>	<b>82</b>	<b>367</b>	<b>81</b>	<b>90</b>	<b>70</b>	<b>73</b>	<b>314</b>	<b>301</b>
Depr and Amort	198	222	62	57	60	60	239	50	50	50	50	200	200
<b>EBITDA</b>	<b>715</b>	<b>724</b>	<b>171</b>	<b>150</b>	<b>143</b>	<b>142</b>	<b>606</b>	<b>131</b>	<b>140</b>	<b>120</b>	<b>123</b>	<b>514</b>	<b>501</b>
Interest Expense, Net	26	30	7	7	8	8	30	8	8	8	8	32	31
Other Expense	(0)	(1)	0	0	-	-	1	-	-	-	-	-	-
Exceptional Items	-	-	-	-	-	-	-	-	-	-	-	-	-
Pretax Income	491	474	102	85	75	74	336	73	82	62	65	282	270
Provision for Income Taxes	97	107	25	21	17	17	81	17	19	14	15	65	62
Effective Tax Rate	20%	23%	25%	25%	23%	23%	24%	23%	23%	23%	23%	23%	23%
<b>Non-GAAP Net Income</b>	<b>394.23</b>	<b>366.85</b>	<b>76.28</b>	<b>63.68</b>	<b>58.00</b>	<b>57.00</b>	<b>254.96</b>	<b>56.08</b>	<b>62.78</b>	<b>47.76</b>	<b>50.29</b>	<b>216.90</b>	<b>208.06</b>
GAAP Net Income	340.00	320.90	41.28	39.18	42.00	35.00	157.46	56.08	62.78	47.76	50.29	216.90	208.06
Non-GAAP Basic EPS	5.02	4.75	1.07	0.90	0.82	0.85	3.65	0.88	1.01	0.78	0.84	3.50	3.63
<b>Non-GAAP Diluted EPS</b>	<b>4.96</b>	<b>4.70</b>	<b>1.05</b>	<b>0.89</b>	<b>0.81</b>	<b>0.84</b>	<b>3.60</b>	<b>0.87</b>	<b>0.99</b>	<b>0.77</b>	<b>0.82</b>	<b>3.46</b>	<b>3.58</b>
GAAP Basic EPS	4.33	4.16	0.58	0.55	0.60	0.52	2.25	0.88	1.01	0.78	0.84	3.50	3.63
GAAP Diluted EPS	4.28	4.11	0.57	0.55	0.59	0.52	2.22	0.87	0.99	0.77	0.82	3.46	3.58
F12 EPS	0.00	0.00	2.23	2.53	2.98	3.16	0.00	3.46	3.45	3.49	3.48	0.00	0.00
F12 Operating EPS	0.00	0.00	3.89	3.70	3.90	3.86	0.00	3.85	3.85	3.89	3.89	0.00	0.00
Basic Shares Outstanding	79	77	71	71	70	67	70	63	62	61	60	62	57
Diluted Shares Outstanding	79	78	72	72	71	67	71	64	63	62	61	63	58
<b>Percent of Revenue</b>													
Gross Margin	37.0%	38.4%	39.4%	40.6%	39.3%	39.3%	39.6%	41.7%	43.1%	42.4%	42.0%	42.3%	43.4%
R&D	8.8%	9.0%	9.7%	10.3%	10.0%	10.4%	10.1%	10.7%	10.8%	11.0%	11.4%	11.0%	11.8%
SG&A	15.4%	16.9%	18.1%	19.4%	19.3%	19.1%	19.0%	20.4%	20.2%	21.0%	19.9%	20.4%	20.4%
Options Expense	0.6%	0.6%	0.6%	0.8%	0.7%	0.7%	0.7%	0.7%	0.8%	0.8%	0.8%	0.8%	0.8%
Total Operating Expense	24.2%	25.8%	27.8%	29.7%	29.3%	29.5%	29.1%	31.1%	31.0%	32.0%	31.3%	31.3%	32.2%
Operating Income	12.3%	12.0%	11.0%	10.1%	9.3%	9.1%	9.9%	9.9%	11.4%	9.6%	9.9%	10.2%	10.4%
Non-GAAP Net Income	9.4%	8.8%	7.7%	6.9%	6.5%	6.4%	6.9%	6.8%	8.0%	6.5%	6.8%	7.0%	7.2%
<b>% Change Year to Year</b>													
Total Revenue	8.5%	-0.8%	-4.3%	-12.1%	-13.2%	-15.4%	-11.3%	-17.4%	-14.2%	-18.5%	-17.5%	-16.9%	-6.0%
Total Revenue, CC	0.0%	0.0%	0.0%	-8.0%	-6.0%	0.0%	-6.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Currency Impact	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Cost of Sales	5.3%	-3.0%	-6.1%	-13.0%	-15.9%	-16.9%	-13.0%	-20.5%	-17.9%	-22.7%	-21.1%	-20.5%	-7.8%
R&D	-1.7%	1.5%	6.4%	4.4%	-5.3%	-5.1%	-0.1%	-9.4%	-9.7%	-10.2%	-9.8%	-9.8%	1.0%
SG&A	7.2%	8.7%	2.2%	3.1%	-2.2%	-4.1%	-0.3%	-6.5%	-11.0%	-11.5%	-14.0%	-10.7%	-5.6%
Options Expense	0.0%	0.0%	0.0%	16.7%	0.0%	0.0%	4.2%	0.0%	-14.3%	0.0%	0.0%	-4.0%	0.0%
Total Operating Expense	3.7%	6.0%	3.6%	3.8%	-3.2%	-4.4%	-0.1%	-7.4%	-10.7%	-10.8%	-12.2%	-10.3%	-3.2%
Operating Income	44.8%	-2.9%	-12.2%	-37.4%	-22.6%	-33.4%	-27.0%	-25.8%	-3.4%	-15.9%	-10.6%	-14.5%	-4.0%
Non-GAAP Net Income	54.2%	-6.9%	-16.2%	-41.7%	-22.0%	-38.3%	-30.5%	-26.5%	-1.4%	-17.7%	-11.8%	-14.9%	-4.1%
Non-GAAP Diluted EPS	52.5%	-5.2%	-7.5%	-34.7%	-14.6%	-32.3%	-23.4%	-17.2%	11.6%	-5.6%	-2.4%	-4.0%	3.5%

Source: Company report, Citi Research

Figure 4. Balance Sheet and Cash Flow Statement (Detailed Model Available Upon Request)

Balance Sheet Fiscal Year Ends December Dollars in Millions	2010	2011	2012				2012	2013				2013	2014
	FYA	FYA	1QA Mar-12	2Q Jun-12	3QE Sep-12	4QE Dec-12	FYE	1QE Mar-13	2QE Jun-13	3QE Sep-13	4QE Dec-13	FYE	FYE
Cash & Equivalents	1217	1149	949	916	828	876	876	762	784	722	832	832	859
Trade Receivables	480	458	474	479	407	387	387	487	483	392	378	378	422
Total Inventory	366	336	329	306	305	290	290	288	293	279	269	269	274
Prepaid Expenses and Other	207	266	244	248	225	225	225	201	212	183	186	186	189
<b>Total Current Assets</b>	<b>2270</b>	<b>2209</b>	<b>1996</b>	<b>1948</b>	<b>1764</b>	<b>1778</b>	<b>1778</b>	<b>1738</b>	<b>1772</b>	<b>1577</b>	<b>1665</b>	<b>1665</b>	<b>1744</b>
Property, Plant & Equipment, net	905	889	882	878	867	835	835	834	833	831	830	830	830
Goodwill	185	216	371	359	359	359	359	359	359	359	359	359	359
Intangibles	155	151	231	224	224	224	224	224	224	224	224	224	224
Other Assets	190	172	179	166	161	145	145	148	143	131	120	120	122
<b>Total Assets</b>	<b>3705</b>	<b>3637</b>	<b>3658</b>	<b>3575</b>	<b>3375</b>	<b>3341</b>	<b>3341</b>	<b>3302</b>	<b>3330</b>	<b>3122</b>	<b>3197</b>	<b>3197</b>	<b>3279</b>
Short-term Debt	0	0	0	0	0	0	0	0	0	0	0	0	0
Current Portion of LTD	0	0	0	350	350	350	350	350	350	350	350	350	350
Accounts Payable	535	487	473	429	413	404	404	376	353	319	319	319	290
Accrued Liabilities	711	637	603	594	562	538	538	499	509	458	444	444	453
Other Current Liabilities	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>Total Current Liabilities</b>	<b>1246</b>	<b>1123</b>	<b>1077</b>	<b>1373</b>	<b>1326</b>	<b>1293</b>	<b>1293</b>	<b>1225</b>	<b>1212</b>	<b>1128</b>	<b>1114</b>	<b>1114</b>	<b>1093</b>
Long-term Debt	649	649	649	300	300	300	300	300	300	300	300	300	300
Other Non-Current Liabilities	416	473	485	475	322	400	400	400	407	263	330	330	336
<b>Total Liabilities</b>	<b>2311</b>	<b>2245</b>	<b>2211</b>	<b>2147</b>	<b>1948</b>	<b>1992</b>	<b>1992</b>	<b>1925</b>	<b>1918</b>	<b>1690</b>	<b>1743</b>	<b>1743</b>	<b>1728</b>
<b>Stockholders' Equity</b>	<b>1394</b>	<b>1392</b>	<b>1448</b>	<b>1429</b>	<b>1428</b>	<b>1350</b>	<b>1350</b>	<b>1378</b>	<b>1412</b>	<b>1432</b>	<b>1454</b>	<b>1454</b>	<b>1550</b>
<b>Total Liabilities &amp; Equity</b>	<b>3705</b>	<b>3637</b>	<b>3658</b>	<b>3575</b>	<b>3375</b>	<b>3341</b>	<b>3341</b>	<b>3302</b>	<b>3330</b>	<b>3122</b>	<b>3197</b>	<b>3197</b>	<b>3279</b>
<b>Cashflow Statement</b>													
Fiscal Year Ends December Dollars in Millions	2010	2011	2012				2012	2013				2013	2014
	FYA	FYA	1QA Mar-12	2Q Jun-12	3QE Sep-12	4QE Dec-12	FYE	1QE Mar-13	2QE Jun-13	3QE Sep-13	4QE Dec-13	FYE	FYE
Net Income (Loss)	340	321	61	39	42	35	177	56	63	48	50	217	208
Depreciation and Amortization	198	222	62	57	60	60	239	50	50	50	50	200	200
Deferred Taxes	-2	41	-1	0	0	0	-1	0	0	0	0	0	0
Tax Benefits from Employee Stock Options	0	0	0	0	0	0	0	0	0	0	0	0	0
Other	19	23	6	-7	0	0	-1	0	0	0	0	0	0
Restructuring Charges	9	0	0	0	0	0	0	0	0	0	0	0	0
Trade Receivables	-29	24	-8	0	0	0	-8	0	0	0	0	0	0
Receivables	0	0	0	-5	73	20	87	-100	4	91	15	9	-45
Inventories	-9	31	7	23	1	15	45	2	-5	14	10	22	-5
Accounts Payable	23	-51	-17	-44	-16	-9	-86	-28	-24	-33	0	-85	-29
Accrued Liabilities	39	-84	-47	-10	-31	-24	-112	-40	11	-51	-14	-94	8
Other Liabilities	-67	-136	30	-4	23	0	48	24	-11	29	-3	39	-3
<b>Cash Flows from Operations</b>	<b>520</b>	<b>391</b>	<b>92</b>	<b>49</b>	<b>151</b>	<b>96</b>	<b>388</b>	<b>-35</b>	<b>88</b>	<b>147</b>	<b>109</b>	<b>308</b>	<b>334</b>
PP&E, including Rentals	-161	-157	-48	-38	-49	-49	-185	-49	-49	-49	-49	-195	-200
Proceeds from Sales of PP&E	6	4	0	0	0	0	0	0	0	0	0	0	0
Purchases of Marketable Securities	-1334	-1400	-370	0	0	0	-370	0	0	0	0	0	0
Proceeds from Marketable Securities	1132	1497	405	0	0	0	405	0	0	0	0	0	0
Other	-273	-41	-205	2	-147	93	-256	-2	12	-133	78	-44	4
<b>Cash Flows from Investing</b>	<b>-631</b>	<b>-97</b>	<b>-219</b>	<b>-36</b>	<b>-196</b>	<b>43</b>	<b>-407</b>	<b>-50</b>	<b>-37</b>	<b>-182</b>	<b>30</b>	<b>-239</b>	<b>-196</b>
Change in Short-Term Debt	0	0	-18	0	0	0	-18	0	0	0	0	0	0
Change in Long Term Debt	-3	-7	-4	0	0	0	-4	0	0	0	0	0	0
Issuance of Treasury Stock	0	0	0	0	0	0	0	0	0	0	0	0	0
Purchase of Treasury Stock	0	-250	-30	0	0	0	-30	0	0	0	0	0	0
Proceeds from Exercise of Options	1	0	6	0	0	0	6	0	0	0	0	0	0
Charges related to Debt Extinguishment	0	0	0	0	0	0	0	0	0	0	0	0	0
Other	-10	-15	2	-58	-43	-113	-213	-28	-28	-28	-28	-112	-112
<b>Cash Flows from Financing</b>	<b>-12</b>	<b>-272</b>	<b>-45</b>	<b>-58</b>	<b>-43</b>	<b>-113</b>	<b>-259</b>	<b>-28</b>	<b>-28</b>	<b>-28</b>	<b>-28</b>	<b>-112</b>	<b>-112</b>
Currency Translation Impact	1	-3	1	0	0	0	1	0	0	0	0	0	0
<b>Net Change in Cash</b>	<b>-122</b>	<b>19</b>	<b>-170</b>	<b>-45</b>	<b>-88</b>	<b>26</b>	<b>-276</b>	<b>-114</b>	<b>23</b>	<b>-62</b>	<b>110</b>	<b>-43</b>	<b>26</b>
Beginning Cash Balance	911	789	808	638	593	505	808	531	418	440	378	531	488
<b>Ending Cash Balance (incl. mkt securities)</b>	<b>789</b>	<b>808</b>	<b>638</b>	<b>593</b>	<b>505</b>	<b>531</b>	<b>531</b>	<b>418</b>	<b>440</b>	<b>378</b>	<b>488</b>	<b>488</b>	<b>514</b>

Source: Company report, Citi Research

## Company Focus

- Company Update
- Initiation of Coverage

<b>Neutral</b>	<b>2</b>
Price (05 Oct 12)	US\$17.08
Target price	US\$18.00
Expected share price return	5.4%
Expected dividend yield	0.0%
<b>Expected total return</b>	<b>5.4%</b>
Market Cap	US\$795M

### Price Performance (RIC: EFII.O, BB: EFII US)



## Electronics for Imaging Inc (EFII) Macro Weakness To Pressure Print Revenue Growth

- **Stock Call** — We are initiating coverage of Electronics for Imaging Inc (EFII) with a Neutral rating and a target price of \$18. We view the shares to be fairly valued with limited upside to estimates. Our Neutral rating compares with consensus rating distribution of 100% Buy ratings. Favorable secular trends in industrial/commercial printing coupled with the company's emphasis on shareholder returns are offset by weak macro trends which will hamper overall IT spending and print demand near term, and the volatility associated with the product cycle-driven controller business which comprises 45% of non-GAAP gross profit—as well as our assessment that operating margins are likely to expand at a slower rate going forward given that wide-format inkjet will drive a larger percentage of revenue growth.
- **What could make us more positive?** — We would become more constructive on the shares if the following catalysts materialize: 1) overall macro environment and unemployment rates improves, particularly in Europe, 2) checks suggest 4Q12 capex budget flush is occurring, 3) EFII is able to drive operating margin expansion in a constrained revenue growth environment.
- **What could make us more negative?** — We may become more negative on the shares if the following occurs: 1) further deterioration of the macro environment and IT demand, 2) significantly constrained 4Q12 enterprise IT capex spend, 3) more aggressive pricing from competitors, 4) unattractive acquisitions that pose integration challenges and poor return profile.
- **Valuation** — Our target price of \$18 is based on 13x F12-month EPS 12 months from now. During the past two years EFI shares have traded in a range of 10-18x F12 non- GAAP EPS with a median of 13x. We are using a target multiple of 13x, in line with median multiples due to the current macro backdrop, the long-term secular headwinds facing the imaging industry, and the lower growth rates projected, partially offset by the higher cash generation capability. EFI's shares currently trade at 12.5x F12M EPS estimates and we are not forecasting any material upside to consensus estimates or multiple expansion. Our Neutral stock rating is more conservative than consensus which has 100% buy ratings.

EPS	Q1	Q2	Q3	Q4	FY	FC Cons
<b>2011A</b>	0.28A	0.23A	0.25A	0.36A	1.12A	1.12A
<b>2012E</b>	<b>0.30A</b>	<b>0.30A</b>	<b>0.26E</b>	<b>0.35E</b>	<b>1.20E</b>	<b>1.20E</b>
Previous	na	na	na	na	na	na
<b>2013E</b>	<b>0.31E</b>	<b>0.33E</b>	<b>0.32E</b>	<b>0.41E</b>	<b>1.37E</b>	<b>1.40E</b>
Previous	na	na	na	na	na	na
<b>2014E</b>	<b>0.34E</b>	<b>0.36E</b>	<b>0.35E</b>	<b>0.44E</b>	<b>1.48E</b>	<b>na</b>
Previous	na	na	na	na	na	na

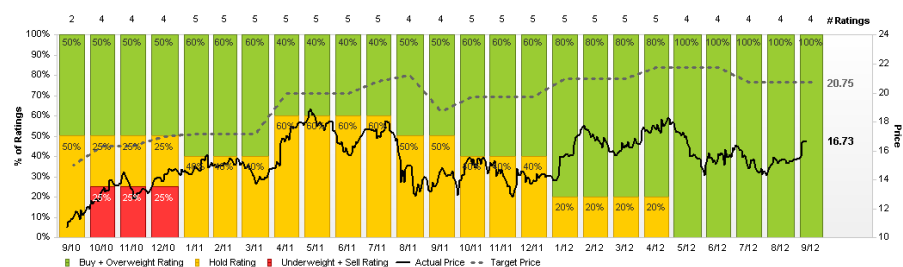
Source: Company Reports and dataCentral, Citi Research. FC Cons: First Call Consensus.

## Recent Results and Outlook

For 2Q12, EFII delivered revenues of \$163.9M (+16% y/y, +2% q/q) slightly above Street expectations of \$162.4M (EFII guided for ~15% growth y/y to ~\$162M). 2Q12 marked EFII's 10<sup>th</sup> consecutive quarter of double digit y/y revenue growth. The industrial inkjet business (~50% of revenues) grew by 39% y/y, while the productivity software business (~15% of revenues) also posted solid growth of 25% y/y. On the other hand, the Fiery controller segment (~15% of revenues) was down 10% y/y. Gross margins were flat sequentially but down 100 bps on mix shift away from high margin controller business towards lower margin inkjet business. Operating expenses were well managed, resulting in 12% operating income. EPS of \$0.30 was in line with consensus expectations (EFII guided 0.29-0.30), despite a \$0.03 negative impact from currency. EFII also announced an agreement to sell their headquarter property by October 2012 and use the proceeds along with cash on hand to buyback shares (~\$100M) through the end of 2013.

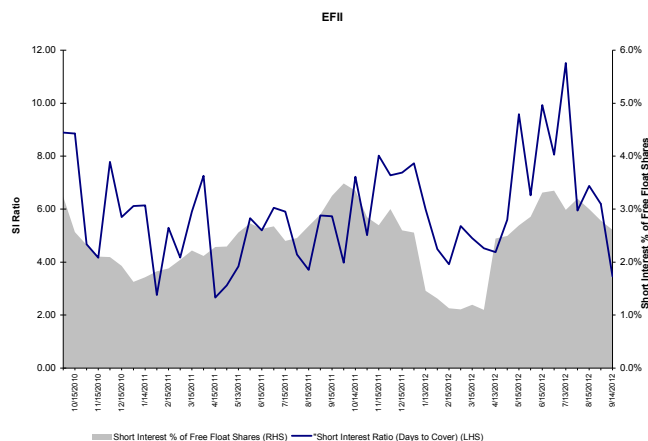
For 3Q12, management guided revenues to grow by 2-5% y/y given macro and currency headwinds, coupled with the cyclical decline in Fiery controller business as OEM customers delay new product launches. This implies revenues of \$150-\$155M which was below consensus of \$165M. Management guided gross margins are expected to be flat while the company continues to manage operating expenses to remain within the 40-44% range, driving EPS of \$0.25-\$0.27 which compared to consensus of \$0.32

Figure 1. EFII Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Figure 2. EFII Short Interest Analysis



Source: FactSet and Citi Research

Figure 3. EFIG Income Statement (detailed model available upon request)

Income Statement (EFIG)	2010	2011	2012				2012	2013				2013	2014
Fiscal Year Ends December	FYA	FYA	1QA	2Q	3QE	4QE	FYE	1QE	2QE	3QE	4QE	FYE	FYE
Dollars in Thousand			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
<b>Controller Product Revenue (Fiery)</b>	<b>\$238,621</b>	<b>\$270,073</b>	<b>\$60,895</b>	<b>\$58,359</b>	<b>\$53,107</b>	<b>\$54,169</b>	<b>\$226,530</b>	<b>\$56,877</b>	<b>\$58,015</b>	<b>\$58,595</b>	<b>\$59,767</b>	<b>\$233,254</b>	<b>\$239,067</b>
% of total revenue	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
% chg yr to yr	\$0	\$0	(\$0)	(\$0)	(\$0)	(\$0)	(\$0)	(\$0)	(\$0)	\$0	\$0	\$0	\$0
% chg qtr to qtr	-	-	(\$0)	(\$0)	(\$0)	\$0	-	\$0	\$0	\$0	\$0	-	-
Gross Margin	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1
<b>Industrial Inkjet</b>	<b>\$207,653</b>	<b>\$240,319</b>	<b>\$75,092</b>	<b>\$79,820</b>	<b>\$74,233</b>	<b>\$89,079</b>	<b>\$318,224</b>	<b>\$81,953</b>	<b>\$86,050</b>	<b>\$80,887</b>	<b>\$93,021</b>	<b>\$341,911</b>	<b>\$356,495</b>
% of total revenue	\$0	\$0	\$0	\$0	\$0	\$1	\$0	\$0	\$1	\$0	\$1	\$0	\$0
% chg yr to yr	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
% chg qtr to qtr	-	-	\$0	\$0	(\$0)	\$0	-	(\$0)	\$0	(\$0)	\$0	-	-
Gross Margin	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<b>Productivity Software (APPS)</b>	<b>\$57,733</b>	<b>\$81,165</b>	<b>\$24,069</b>	<b>\$25,722</b>	<b>\$25,722</b>	<b>\$27,008</b>	<b>\$102,521</b>	<b>\$27,008</b>	<b>\$27,818</b>	<b>\$29,209</b>	<b>\$30,670</b>	<b>\$114,705</b>	<b>\$126,331</b>
% of total revenue	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
% chg yr to yr	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
% chg qtr to qtr	-	-	\$0	\$0	\$0	\$0	-	\$0	\$0	\$0	\$0	-	-
Gross Margin	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1	\$1
<b>Revenue</b>	<b>\$504,007</b>	<b>\$591,557</b>	<b>\$160,056</b>	<b>\$163,901</b>	<b>\$153,061</b>	<b>\$170,256</b>	<b>\$647,274</b>	<b>\$165,838</b>	<b>\$171,884</b>	<b>\$168,692</b>	<b>\$183,457</b>	<b>\$689,870</b>	<b>\$721,893</b>
% chg qtr to qtr	\$0	\$0	(\$0)	\$0	(\$0)	\$0	\$0	(\$0)	\$0	(\$0)	\$0	\$0	\$0
Cost of Sales	\$233,030	\$258,910	\$72,091	\$73,874	\$68,730	\$78,285	\$292,980	\$75,747	\$78,817	\$75,460	\$83,483	\$313,507	\$327,409
<b>Gross Profit</b>	<b>\$270,977</b>	<b>\$332,647</b>	<b>\$87,965</b>	<b>\$90,027</b>	<b>\$84,331</b>	<b>\$91,971</b>	<b>\$354,294</b>	<b>\$90,091</b>	<b>\$93,066</b>	<b>\$93,232</b>	<b>\$99,974</b>	<b>\$376,363</b>	<b>\$394,484</b>
R&D	\$101,653	\$110,177	\$29,336	\$28,967	\$29,114	\$29,341	\$116,758	\$30,184	\$30,096	\$31,195	\$30,933	\$122,408	\$126,981
Sales and Marketing	\$103,629	\$115,354	\$30,161	\$31,376	\$30,023	\$31,478	\$123,038	\$31,033	\$32,599	\$32,170	\$33,186	\$128,987	\$133,776
General and Administration	\$29,883	\$38,106	\$10,402	\$10,023	\$9,889	\$10,044	\$40,357	\$10,703	\$10,414	\$10,697	\$10,667	\$42,479	\$44,064
Total Operating Expense	\$235,165	\$263,637	\$69,899	\$70,366	\$69,026	\$70,862	\$280,153	\$71,919	\$73,108	\$74,061	\$74,786	\$293,874	\$304,821
<b>Operating Income</b>	<b>\$35,812</b>	<b>\$69,010</b>	<b>\$18,066</b>	<b>\$19,661</b>	<b>\$15,305</b>	<b>\$21,109</b>	<b>\$74,141</b>	<b>\$18,172</b>	<b>\$19,959</b>	<b>\$19,170</b>	<b>\$25,188</b>	<b>\$82,489</b>	<b>\$89,662</b>
Depr and Amort	\$20,943	\$18,765	\$6,139	\$6,971	\$6,000	\$6,000	\$25,110	\$6,000	\$6,000	\$6,000	\$6,000	\$24,000	\$24,000
<b>EBITDA</b>	<b>\$56,755</b>	<b>\$87,775</b>	<b>\$24,205</b>	<b>\$26,632</b>	<b>\$21,305</b>	<b>\$27,109</b>	<b>\$99,251</b>	<b>\$24,172</b>	<b>\$25,959</b>	<b>\$25,170</b>	<b>\$31,188</b>	<b>\$106,489</b>	<b>\$113,662</b>
Interest and Other	(\$1,355)	\$221	\$570	(\$1,325)	\$721	\$826	\$792	\$958	\$949	\$945	\$973	\$3,825	\$4,462
<b>Pretax Income</b>	<b>\$34,457</b>	<b>\$69,231</b>	<b>\$18,636</b>	<b>\$18,336</b>	<b>\$16,026</b>	<b>\$21,935</b>	<b>\$74,933</b>	<b>\$19,130</b>	<b>\$20,908</b>	<b>\$20,115</b>	<b>\$26,161</b>	<b>\$86,314</b>	<b>\$94,124</b>
Provision for Income Taxes	\$6,615	\$16,169	\$4,474	\$4,150	\$3,686	\$5,045	\$17,355	\$4,400	\$4,809	\$4,626	\$6,017	\$19,852	\$21,649
Effective Tax Rate	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<b>Non-GAAP Net Income</b>	<b>\$27,842</b>	<b>\$53,062</b>	<b>\$14,162</b>	<b>\$14,186</b>	<b>\$12,340</b>	<b>\$16,890</b>	<b>\$57,578</b>	<b>\$14,730</b>	<b>\$16,099</b>	<b>\$15,488</b>	<b>\$20,144</b>	<b>\$66,462</b>	<b>\$72,476</b>
GAAP Net Income	\$7,487	\$27,465	\$6,234	\$7,005	\$4,340	\$8,890	\$26,469	\$6,730	\$8,099	\$7,488	\$12,144	\$34,462	\$40,476
GAAP Diluted EPS	\$0.16	\$0.58	\$0.13	\$0.15	\$0.09	\$0.18	\$0.55	\$0.14	\$0.17	\$0.15	\$0.25	\$0.71	\$0.82
<b>Non-GAAP Diluted EPS</b>	<b>\$0.59</b>	<b>\$1.12</b>	<b>\$0.30</b>	<b>\$0.30</b>	<b>\$0.26</b>	<b>\$0.35</b>	<b>\$1.20</b>	<b>\$0.31</b>	<b>\$0.33</b>	<b>\$0.32</b>	<b>\$0.41</b>	<b>\$1.37</b>	<b>\$1.48</b>
F12 Non-GAAP EPS	\$0.00	\$0.00	\$0.00	\$1.21	\$1.25	\$1.31	\$0.00	\$1.37	\$1.40	\$1.43	\$1.45	\$0.00	\$0.00
Diluted Shares Outstanding (GAAP)	47,152	47,579	47,359	47,814	47,964	48,114	47,813	48,264	48,414	48,564	48,714	48,489	49,089
Diluted Shares Outstanding (Non-GAAP)	47,152	47,579	47,359	47,814	47,964	48,114	47,813	48,264	48,414	48,564	48,714	48,489	49,089
<b>(Percent of Revenue)</b>													
Gross Margin	54%	56%	55%	55%	55%	54%	55%	54%	54%	55%	54%	55%	55%
R&D	20%	19%	18%	18%	19%	17%	18%	18%	18%	18%	17%	18%	18%
Sales and Marketing	21%	20%	19%	19%	20%	18%	19%	19%	19%	19%	18%	19%	19%
General and Administration	6%	6%	6%	6%	6%	6%	6%	6%	6%	6%	6%	6%	6%
Total Operating Expense	47%	45%	44%	43%	45%	42%	43%	43%	43%	44%	41%	43%	42%
Operating Income	7%	12%	11%	12%	10%	12%	11%	11%	12%	11%	14%	12%	12%
Non-GAAP Net Income	6%	9%	9%	9%	8%	10%	9%	9%	9%	9%	11%	10%	10%
<b>(% Change Year to Year)</b>													
Total Revenue	26%	17%	14%	16%	4%	4%	9%	4%	5%	10%	8%	7%	5%
Cost of Sales	24%	11%	18%	19%	8%	9%	13%	5%	7%	10%	7%	7%	4%
R&D	-2%	8%	10%	7%	3%	4%	6%	3%	4%	7%	5%	5%	4%
Sales and Marketing	6%	11%	10%	10%	3%	4%	7%	3%	4%	7%	5%	5%	4%
General and Administration	5%	28%	11%	6%	3%	4%	6%	3%	4%	8%	6%	5%	4%
Total Operating Expense	2%	12%	10%	8%	3%	4%	6%	3%	4%	7%	6%	5%	4%
Operating Income	0%	93%	16%	40%	-7%	-7%	7%	1%	2%	25%	19%	11%	9%
Pre-tax Income	0%	101%	4%	23%	7%	3%	8%	3%	14%	26%	19%	15%	9%
Non-GAAP Net Income	0%	91%	5%	25%	6%	2%	9%	4%	13%	26%	19%	15%	9%
Non-GAAP Diluted EPS	0%	89%	7%	27%	5%	-1%	8%	2%	12%	24%	18%	14%	8%

Source: Citi Research

Figure 4. EFII Balance Sheet and Cash Flow Statement (detailed model available upon request)

Balance Sheet (EFII)	2010	2011	2012				2012	2013				2013	2014
Fiscal Year Ends December	FYA	FYA	1QA	2Q	3QE	4QE	FYE	1QE	2QE	3QE	4QE	FYE	FYE
Dollars in Thousand			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
Cash & Equivalents	132,152	132,152	113,668	101,825	129,733	164,967	132,152	162,605	161,345	168,926	210,239	132,152	132,152
Short-term Investments	57,199	57,199	89,762	90,551	90,551	90,551	57,199	90,551	90,551	90,551	90,551	57,199	57,199
Accounts Receivable	85,453	91,923	119,516	124,505	95,137	95,981	95,981	123,834	130,569	104,852	103,423	103,423	108,616
Inventory	46,216	44,788	56,494	61,204	49,125	46,765	46,765	58,535	64,185	54,142	50,391	50,391	52,921
Other Current Assets	24,317	20,792	34,898	29,226	40,471	21,710	21,710	36,159	30,649	44,603	23,393	23,393	24,568
Total Current Assets	385,649	376,661	414,338	407,311	405,017	419,974	419,974	471,683	477,299	463,075	477,997	477,997	526,136
Property, Plant & Equipment, net	26,547	30,096	30,610	30,796	27,696	24,596	24,596	21,346	18,096	14,846	11,596	11,596	11,596
Restricted Investments	56,850	56,850	56,850	56,850	56,850	56,850	56,850	56,850	56,850	56,850	56,850	56,850	56,850
Goodwill	139,517	164,323	188,927	200,514	200,514	200,514	200,514	200,514	200,514	200,514	200,514	200,514	200,514
Intangible Assets, Net	49,140	55,992	74,441	76,766	76,766	76,766	76,766	76,766	76,766	76,766	76,766	76,766	76,766
Other Long-Term Assets	48,878	55,812	53,732	53,991	53,991	53,991	53,991	53,991	53,991	53,991	53,991	53,991	53,991
Total Assets	706,581	739,734	818,898	826,228	820,834	832,691	832,691	881,150	883,516	866,042	877,714	877,714	925,853
Short-term Debt	-	-	-	-	-	-	-	-	-	-	-	-	-
Accounts Payable	49,189	46,965	59,259	64,807	47,427	51,199	51,199	62,265	69,144	52,071	54,598	54,598	57,613
Accrued and Other Liabilities	70,028	82,289	112,038	98,668	86,726	85,922	85,922	116,085	103,473	95,583	92,584	92,584	97,232
Income Tax Payable	1,182	2,583	4,414	4,729	2,500	2,500	2,500	3,000	3,000	3,000	3,000	3,000	3,000
Other Current Liabilities	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Current Liabilities	120,399	131,837	175,711	168,204	136,654	139,621	139,621	181,350	175,617	150,654	150,182	150,182	157,845
Deferred Tax Liabilities	32,522	4,090	11,416	13,184	35,000	35,000	35,000	35,000	35,000	35,000	35,000	35,000	35,000
Long-term Debt	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Long-Term Liabilities	1,911	39,024	50,205	53,593	53,593	53,593	53,593	53,593	53,593	53,593	53,593	53,593	53,593
Total Liabilities	154,832	174,951	237,332	234,981	225,247	228,214	228,214	269,943	264,210	239,247	238,775	238,775	246,438
Stockholders' Equity	551,749	564,783	581,566	591,247	595,587	604,477	604,477	611,207	619,306	626,795	638,939	638,939	679,415
Total Liabilities & Equity	706,581	739,734	818,898	826,228	820,834	832,691	832,691	881,150	883,516	866,042	877,714	877,714	925,853
Cashflow Statement (EFII)	2010	2011	2012				2012	2013				2013	2014
Fiscal Year Ends December	FYE	FYA	1QA	2Q	3QE	4QE	FYE	1QE	2QE	3QE	4QE	FYE	FYE
Dollars in Thousand			Mar-12	Jun-12	Sep-12	Dec-12		Mar-13	Jun-13	Sep-13	Dec-13		
Net Income (Loss)	7,487	27,465	6,234	7,005	4,340	8,890	26,469	6,730	8,099	7,488	12,144	34,462	40,476
Depreciation and Amortization	20,943	18,765	6,139	6,971	6,000	6,000	25,110	6,000	6,000	6,000	6,000	24,000	24,000
Acquired In-Process R&D	-	-	-	-	-	-	-	-	-	-	-	-	-
Deferred Taxes	(4,190)	(2,691)	602	679	21,816	-	23,097	-	-	-	-	-	-
Provision for Bad Debt	2,525	-	-	-	-	-	-	-	-	-	-	-	-
Tax impact from stock based compensation	(573)	-	(385)	(110)	-	-	(495)	-	-	-	-	-	-
Stock based compensation	15,925	23,369	4,666	4,767	-	-	9,433	-	-	-	-	-	-
Other	7,252	6,949	2,524	924	-	-	3,448	-	-	-	-	-	-
Changes in Operating Assets and Liabilities	(5,446)	(1,661)	(10,161)	(11,475)	(1,348)	23,244	260	(12,342)	(12,609)	(3,157)	25,918	(2,190)	(1,234)
Accounts Receivable	-	-	-	-	29,368	(844)	28,524	(27,853)	(6,735)	25,717	1,429	(7,442)	(5,193)
Inventories	-	-	-	-	12,079	2,360	14,439	(11,770)	(5,650)	10,043	3,751	(3,626)	(2,530)
Receivables from Subcontract Manufacturers	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Current Assets	-	-	-	-	(11,245)	18,761	7,516	(14,449)	5,509	(13,954)	21,210	(1,683)	(1,175)
Accounts Payable and Accrued Liabilities	-	-	-	-	(29,321)	2,967	(26,354)	41,229	(5,733)	(24,963)	(472)	10,061	7,664
Income Taxes Payable	-	-	-	-	(2,229)	-	(2,229)	500	-	-	-	500	-
Cash Flows from Operations	43,923	72,196	9,619	8,761	30,808	38,134	87,322	388	1,490	10,331	44,062	56,272	63,242
Capital Expenditures	(5,016)	(9,828)	(1,307)	(2,494)	(2,900)	(2,900)	(9,601)	(2,750)	(2,750)	(2,750)	(2,750)	(11,000)	(24,000)
Proceeds from sale of product line	-	-	-	-	-	-	-	-	-	-	-	-	-
Short-term Investments	(6,016)	2,561	8,883	(1,232)	-	-	7,651	-	-	-	-	-	-
Investment in Restricted Investment	-	-	-	-	-	-	-	-	-	-	-	-	-
Business Acquired	(16,448)	(38,436)	(28,759)	(15,774)	-	-	(44,533)	-	-	-	-	-	-
Other (Incl. disposals)	-	3,579	5,216	-	-	-	5,216	-	-	-	-	-	-
Cash Flows from Investing	(27,480)	(42,124)	(15,967)	(19,500)	(2,900)	(2,900)	(41,267)	(2,750)	(2,750)	(2,750)	(2,750)	(11,000)	(24,000)
Repayments on Debt	-	(210)	(5,547)	(1,119)	-	-	(6,666)	-	-	-	-	-	-
Proceeds from Debt	-	-	-	-	-	-	-	-	-	-	-	-	-
Proceeds from Issuance of Stock	6,682	8,123	6,094	8,947	-	-	15,041	-	-	-	-	-	-
Tax benefit from stock based compensation	573	2,038	385	110	-	-	495	-	-	-	-	-	-
Purchase of Treasury Stock	(3,557)	(45,841)	(1,680)	(7,776)	-	-	(9,456)	-	-	-	-	-	-
Other	-	-	-	(252)	-	-	(252)	-	-	-	-	-	-
Cash Flows from Financing	3,698	(35,890)	(748)	(90)	-	-	(838)	-	-	-	-	-	-
Currency Translation Impact	155	(487)	706	(1,014)	-	-	(308)	-	-	-	-	-	-
Net Change in Cash	20,296	(6,305)	(6,390)	(11,843)	27,908	35,234	44,909	(2,362)	(1,260)	7,581	41,312	45,272	39,242
Beginning Cash Balance	106,067	126,363	120,058	113,668	101,825	129,733	120,058	164,967	162,605	161,345	168,926	164,967	210,239
Ending Cash Balance (excl mkt securities)	126,363	120,058	113,668	101,825	129,733	164,967	164,967	162,605	161,345	168,926	210,239	210,239	249,480

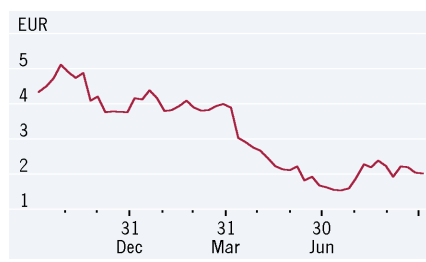
Source: Citi Research

## Company Focus

- Company Update
- Rating Change
- Target Price Change
- Estimate Change

<b>Neutral/High Risk</b>	<b>2H</b>
from Neutral	
Price (05 Oct 12)	€2.04
Target price	€2.12
from €1.80	
Expected share price return	4.0%
Expected dividend yield	4.9%
<b>Expected total return</b>	<b>8.9%</b>
Market Cap	€7,632M
	US\$9,936M

### Price Performance (RIC: NOK1V.HE, BB: NOK1V FH)



## Nokia Oyj (NOK1V.HE)

### Major New Product Strategy & Stock Price Warrants Neutral But High Risk Rating

- **Stock Call** — We are transferring coverage from Amit Harchandani. While we are maintaining our Neutral rating we are making significant changes to estimates to reflect 2Q (June) reported results and a more tempered EPS outlook. However, we are increasing our target price to €2.12 (from €1.80) based on 1x price to book value per share (P/BVPS) and assigning a High Risk rating to this stock. Nokia continues to face multiple challenges from iPhone and Android invasion and is unlikely to gain any material pricing power in a Windows Phone Ecosystem anytime soon. However, with meaningful ecosystem support from carriers globally (and Microsoft), a likely positive Halo effect from Windows 8 (4Q12 launch), the potential disposal of NSN, more aggressive patent monetization, undemanding valuation levels and a 5% dividend yield we see limited downside risk to the current share price. We note consensus has 42% sell ratings on the stock so any positive news around the Q4 product launch could be a positive for the stock.
- **What Could Make Us More Positive** — 1) Additional patent litigation by Apple against the Android ecosystem which would cause carriers to embrace Nokia's Windows phones faster than currently believed; 2) better than expected customer traction of the company's Windows 8 based phones (expected launch in 4Q12) which could result in stabilizing the company's market share and 3) faster than anticipated right sizing of the company's cost structure via restructuring to this new lower market share level.
- **What Could Make Us More Negative** — On the other hand, if the macro demand situation weakens, coupled with a lackluster new product launch and continued restructuring actions needed if Nokia can not stabilize its profitability and cash flows, we believe the shares would continue to trade lower.
- **Valuation** — Our target price of €2.12 is based on 1x book value per share 12 months from now. As EPS estimates are negative to minimal positive, we expect investors to look at book value for valuation support. During the past two years during which Nokia has faced severe share pressures in mobile devices, Nokia shares have traded on an average 1.3x book value per share with a low of 0.5x and a high of 2.3x. Shares are currently trading at 0.8x BV/share and given current macro backdrop, potential for further share losses and potential for further restructuring, we do not expect multiples to revert to the 1.3x mean levels unless Nokia's new Windows phones gain traction (launch in Q4). We note the stock is down 40% year to date and our Neutral rating compares is slightly more constructive than consensus which has 14% Buy, 45% hold and 42% sell ratings as we believe any modestly positive news may help the stock which is viewed with negative sentiment currently.

#### Nokia Oyj (EUR)

Year to 31 Dec	2010A	2011A	2012E	2013E	2014E
Sales (€M)	42,448.0	38,659.0	29,902.1	29,232.4	29,276.9
Net Income (€M)	2,264.0	1,078.0	-1,410.0	-246.3	557.6
Diluted EPS (€)	0.61	0.29	-0.38	-0.07	0.15
Diluted EPS (Old) (€)	0.61	0.11	-0.20	0.07	0.10
PE (x)	3.3	7.0	-5.4	-30.7	13.6
EV/EBITDA (x)	0.4	0.3	-6.1	1.4	0.4
DPS (€)	0.40	0.20	0.20	0.10	0.10
Net Div Yield (%)	19.6	9.8	9.8	4.9	4.9

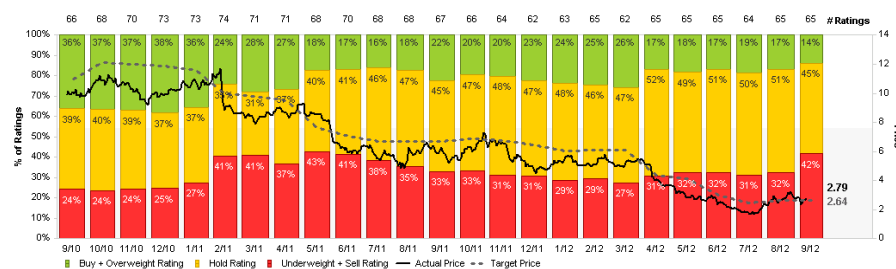


## Recent Results and Outlook

2Q results at Nokia were largely in line with Street expectations which saw downward revision following their negative preannouncement earlier in the quarter. Overall revenues of Euro 7.54B was slightly above consensus estimates of Euro 7.35B while EPS of -0.08 was in line with expectations. Devices and Services segment (which comprises 53% of total revenues) declined by 26% y/y as a 5.6% decline in units y/y was accompanied with a 22.5% y/y decline in ASPs due to Nokia's primary footprint in feature phones which are quickly losing ground to smart phones. Non IFRS operating margins in this segment also declined to -9.1% from -3% in 1Q12 and -1.2% in 2Q11. The Networks segment (~44% of revenues) experienced an 8.2% decline y/y in revenues while margins dipped to 0.8% from 1.1% prior. Lastly the Locations and Commerce segment posted a 4.4% y/y growth with operating margins at 14.5% from 2.6% a year ago.

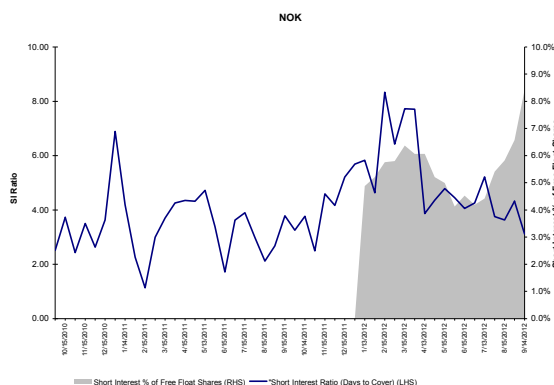
The company did not provide any guidance but continues to expect the Devices segment to remain challenged until new Windows 8 based devices launch and gain customer traction. Operating margins in this segment are expected to remain at 2Q12 levels in 3Q (+/- 4 percentage points). However, management expects to reduce its Devices & Services non-IFRS operating expenses to an annualized run rate of approximately €3.0B by the end of 2013. The Networks segment is expected to see some improvement in operating margins as operating expenses are targeted to be reduced by €1B by the end of 2013, compared to the end of 2011.

Figure 1. NOK Consensus Ratings & Target Price Analysis



Source: FactSet and Citi Research

Figure 2. NOK Short Interest Analysis



Note NOK free float data only available since January 2012.

Source: FactSet and Citi Research

Figure 3. NOK Income Statement (detailed Model Available Upon Request)

Financial year ended December 31 (EUR m)	2010	2011	1Q12	2Q12	3Q12E	4Q12E	2012E	1Q13E	2Q13E	3Q13E	4Q13E	2013E	2014E
Revenue	42,448	38,659	7,354	7,542	6,997	8,009	29,902	6,815	7,206	7,257	7,954	29,232	29,277
Cost of Goods Sold	-29,631	-27,333	-5,320	-5,761	-5,162	-5,860	-22,103	-5,051	-5,313	-5,311	-5,746	-21,421	-21,293
Gross Profit	12,817	11,326	2,034	1,781	1,835	2,149	7,799	1,764	1,894	1,946	2,208	7,811	7,984
Gross Margin	30.2%	29.3%	27.7%	23.6%	26.2%	26.8%	26.1%	25.9%	26.3%	26.8%	27.8%	26.7%	27.3%
Restructuring/Other One off in Cost of Goods Sold	-43	604	0	-55	0	0	-55	0	0	0	0	0	0
Adjusted Gross Profit	12,860	10,722	2,035	1,836	1,835	2,149	7,855	1,764	1,894	1,946	2,208	7,811	7,984
Adjusted Gross Margin	30.3%	27.7%	27.7%	24.3%	26.2%	26.8%	26.3%	25.9%	26.3%	26.8%	27.8%	26.7%	27.3%
Adjusted Research & Development	-5,288	-5,172	-1,212	-1,130	-1,124	-1,152	-4,618	-1,015	-961	-855	-935	-3,766	-3,449
Adjusted Sales and Marketing	-3,448	-3,347	-765	-793	-781	-828	-3,167	-718	-640	-543	-547	-2,449	-2,035
Adjusted Administration	-1,038	-1,084	-283	-220	-219	-227	-950	-213	-205	-187	-164	-770	-614
Adjusted Other Income & Expenses	11	55	-35	-20	-18	-21	-95	-17	-19	-18	-13	-67	-39
Operating Profit (reported)	2,070	-1,073	-1,340	-826	-611	-384	-3,161	-502	-236	38	245	-456	830
Operating Margin	4.9%	-2.8%	-18.2%	-11.0%	-8.7%	-4.8%	-10.6%	-7.4%	-3.3%	0.5%	3.1%	-1.6%	2.8%
Amortisation	-963	-834	-206	-195	-194	-194	-789	-194	-194	-194	-194	-776	-776
Restructuring	-21	-927	-873	-304	-110	-110	-1,397	-110	-110	-110	-110	-440	-240
Other Non Recurring	24	-1,090	-1	0	0	0	-1	0	0	0	0	0	0
EBITA (adjusted)	3,204	1,825	-260	-327	-307	-80	-974	-198	68	342	549	760	1,846
Adjusted EBITA Margin	7.5%	4.7%	-3.5%	-4.3%	-4.4%	-1.0%	-3.3%	-2.9%	0.9%	4.7%	6.9%	2.6%	6.3%
Associates	1	-23	-1	-4	-4	-4	-13	-4	-4	-4	-4	-16	-16
Net Financial Income	-285	-102	-129	-48	-41	-45	-263	-45	-48	-45	-48	-185	-234
Profit Before Tax	1,786	-1,198	-1,470	-878	-656	-432	-3,437	-551	-288	-10	193	-657	581
Profit Before tax (adjusted)	2,920	1,700	-390	-379	-352	-128	-1,250	-247	16	294	497	559	1,597
Tax (adjusted)	-827	-692	-38	72	-109	-116	-192	-114	-116	-118	-123	-472	-489
Adjusted Minorities	169	70	146	-8	-19	-87	33	-10	-52	-100	-171	-333	-543
Net Profit (adjusted)	2,262	1,078	-282	-315	-481	-331	-1,409	-371	-153	75	202	-246	565
EPS - reported (diluted)	0.50	-0.32	-0.25	-0.38	-0.12	-0.09	-0.84	-0.10	-0.05	-0.01	0.02	-0.13	0.05
EPS - adjusted (diluted)	0.61	0.29	-0.08	-0.08	-0.13	-0.09	-0.38	-0.10	-0.04	0.02	0.05	-0.07	0.15
DPS	0.40	0.20	0.00	0.00	0.00	0.00	0.20	0.00	0.00	0.00	0.00	0.10	0.10

ANNUAL GROWTH RATES	2010	2011	1Q12	2Q12	3Q12E	4Q12E	2012E	1Q13E	2Q13E	3Q13E	4Q13E	2013E	2014E
Group Revenue	3.6%	-8.9%	-29.3%	-18.7%	-22.1%	-20.0%	-22.7%	-7.3%	-4.5%	3.7%	-0.7%	-2.2%	0.2%
Global Handset Units	19.8%	13.0%	17.5%	14.8%	12.5%	10.2%	13.5%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Nokia Global Handset Units	4.9%	-7.9%	-23.8%	-5.4%	-32.8%	-30.2%	-23.9%	-17.1%	-16.5%	-0.9%	-6.0%	-10.5%	-6.1%
Global Smartphone Units	72.1%	59.0%	47.8%	54.7%	64.7%	55.3%	55.9%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Nokia Global Smartphone Units	47.9%	-22.9%	-50.8%	-38.9%	-45.4%	-46.1%	-45.9%	-14.8%	1.3%	18.2%	13.1%	3.4%	9.6%
Global Mobile Phone Units	12.2%	2.7%	8.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Nokia Global Mobile Phone Units	-3.1%	-3.7%	-16.0%	2.4%	-30.4%	-26.8%	-18.9%	-17.5%	-18.9%	-3.7%	-9.0%	-12.6%	-9.0%
Nokia Smartphone ASP	-20.8%	-5.6%	-1.8%	7.3%	16.9%	14.3%	8.2%	13.0%	8.2%	8.2%	4.1%	8.5%	4.1%
Nokia Mobile Phone ASP	-6.8%	-9.6%	-19.2%	-12.8%	-3.9%	-4.6%	-10.3%	-7.3%	-3.0%	-4.0%	-3.0%	-4.4%	-2.0%
Nokia Group ASP	-0.3%	-10.8%	-21.4%	-22.2%	-2.1%	-3.7%	-13.0%	2.1%	9.5%	7.5%	6.9%	6.5%	7.3%
Smartphone Revenue	17.2%	-27.3%	-51.7%	-34.5%	-36.1%	-38.4%	-41.4%	-3.7%	9.7%	27.9%	17.7%	12.2%	14.0%
Mobile Phones Revenue	-9.7%	-12.9%	-32.2%	-10.8%	-33.2%	-30.2%	-27.3%	-23.5%	-21.3%	-7.5%	-11.7%	-16.4%	-10.8%
Devices Revenue	4.9%	-20.4%	-42.1%	-22.1%	-34.4%	-34.1%	-34.0%	-15.1%	-8.9%	7.3%	1.4%	-4.3%	1.5%
Other Revenue	-7.1%	111.5%	52.0%	-65.1%	-29.1%	5.1%	-29.3%	-18.8%	-1.8%	-6.5%	-15.0%	-11.0%	-15.0%
Devices & Services Revenue	4.6%	-17.8%	-40.1%	-26.4%	-34.2%	-32.7%	-33.8%	-15.3%	-8.5%	6.5%	0.5%	-4.7%	0.7%
Networks Revenue	0.7%	10.9%	-7.1%	-8.2%	-5.5%	-2.8%	-5.8%	2.0%	-1.1%	0.4%	-2.2%	-0.4%	-0.7%
Navteq Revenue	29.9%	25.4%	19.4%	4.4%	3.4%	9.5%	8.8%	6.5%	6.3%	8.4%	5.6%	6.7%	6.1%
Gross Profit	-7.5%	-8.5%	-5.5%	-10.2%	-2.8%	-6.3%	-5.3%	-6.5%	7.9%	2.2%	3.4%	1.7%	2.1%
Adjusted Research & Development	-4.5%	7.4%	29.2%	6.9%	16.8%	9.8%	15.4%	-9.6%	-11.0%	-26.6%	-18.4%	-16.6%	-8.5%
Adjusted Sales and Marketing	-2.0%	-2.9%	-6.8%	-9.1%	0.0%	-5.2%	-5.4%	-6.1%	-19.2%	-30.5%	-33.9%	-22.7%	-16.9%
Adjusted Administration	-0.4%	4.4%	11.4%	-23.9%	-22.7%	-11.7%	-12.3%	-24.8%	-6.6%	-14.7%	-27.6%	-19.0%	-20.2%
Total Operating Costs	-1.5%	-2.2%	-3.5%	-12.4%	-5.9%	-8.1%	-7.5%	-14.5%	-15.6%	-25.2%	-25.6%	-20.2%	-13.0%
EBITA - adjusted	-8.5%	-43.0%	-136.9%	-183.6%	-221.9%	-116.7%	-153.4%	-23.8%	-120.7%	-211.4%	-789.2%	-178.1%	142.8%
EPS - adjusted	-7.7%	-52.3%	-157.7%	-231.9%	-488.0%	-246.5%	-230.7%	31.6%	-51.5%	-115.6%	-161.1%	-82.5%	-329.3%

Source: Company report, Citi Research

Figure 4. Balance Sheet and Cash Flow Statement (Detailed Model Available Upon Request)

Nokia - Balance Sheet 2008A-2015E (Euro in millions)													
Financial year ended December 31 (EUR m)	2010	2011	1Q12	2Q12	3Q12E	4Q12E	2012E	1Q13E	2Q13E	3Q13E	4Q13E	2013E	2014E
Goodwill and Intangibles	7,691	6,250	6,003	5,984	5,540	5,346	5,346	5,152	4,958	4,764	4,570	4,570	3,794
Tangible Assets	1,954	1,842	1,764	1,683	1,618	1,576	1,576	1,519	1,474	1,435	1,412	1,412	1,292
Investments	669	708	700	751	751	751	751	751	751	751	751	751	751
Other	1,664	1,950	2,080	1,463	1,463	1,463	1,463	1,463	1,463	1,463	1,463	1,463	1,463
<b>Total Fixed Assets</b>	<b>11,978</b>	<b>10,750</b>	<b>10,547</b>	<b>9,881</b>	<b>9,372</b>	<b>9,136</b>	<b>9,136</b>	<b>8,885</b>	<b>8,646</b>	<b>8,413</b>	<b>8,196</b>	<b>8,196</b>	<b>7,300</b>
Inventories	2,523	2,330	2,345	2,126	2,069	2,157	2,157	2,191	1,955	2,129	2,115	2,115	2,064
Receivables	7,570	7,181	6,133	5,963	5,824	6,315	6,315	5,975	6,397	6,521	7,235	7,235	7,067
Pre-paid expenses & accrued income	4,360	4,488	4,021	3,576	3,576	3,576	3,576	3,576	3,576	3,576	3,576	3,576	3,576
Cash & short term investments	12,275	10,902	9,793	9,418	9,743	9,765	9,765	10,097	9,744	10,105	10,084	10,084	12,249
Other current Assets	417	554	330	349	349	349	349	349	349	349	349	349	349
<b>Total Current Assets</b>	<b>27,145</b>	<b>25,455</b>	<b>22,622</b>	<b>21,432</b>	<b>21,561</b>	<b>22,162</b>	<b>22,162</b>	<b>22,188</b>	<b>22,021</b>	<b>22,681</b>	<b>23,359</b>	<b>23,359</b>	<b>25,305</b>
<b>Total Assets</b>	<b>39,123</b>	<b>36,205</b>	<b>33,169</b>	<b>31,313</b>	<b>30,933</b>	<b>31,298</b>	<b>31,298</b>	<b>31,072</b>	<b>30,667</b>	<b>31,094</b>	<b>31,555</b>	<b>31,555</b>	<b>32,604</b>
Creditors	6,101	5,532	4,579	4,549	4,234	4,550	4,550	4,335	4,184	4,357	4,462	4,462	4,355
Short-term debt	1,037	1,352	1,047	1,298	1,298	1,298	1,298	1,298	1,298	1,298	1,298	1,298	1,298
Other Financial Liabilities	447	483	233	295	545	795	795	1,045	1,295	1,545	1,795	1,795	2,795
Accrued expenses	7,365	7,431	7,226	7,318	7,318	7,318	7,318	7,318	7,318	7,318	7,318	7,318	7,318
Provisions	2,590	2,646	3,037	2,850	2,850	2,850	2,850	2,850	2,850	2,850	2,850	2,850	2,850
<b>Total Current Liabilities</b>	<b>17,540</b>	<b>17,444</b>	<b>16,122</b>	<b>16,310</b>	<b>16,245</b>	<b>16,811</b>	<b>16,811</b>	<b>16,846</b>	<b>16,945</b>	<b>17,368</b>	<b>17,723</b>	<b>17,723</b>	<b>18,616</b>
Interest-bearing long-term liabilities	4,242	3,969	3,874	3,923	3,923	3,923	3,923	3,923	3,923	3,923	3,923	3,923	3,923
Long term liabilities	1,110	876	831	760	760	760	760	760	760	760	760	760	760
Capital & reserves	14,384	11,873	10,892	9,009	8,742	8,539	8,539	8,333	7,853	7,845	7,886	7,886	7,816
Minorities	1,847	2,043	1,450	1,311	1,263	1,265	1,265	1,210	1,187	1,198	1,263	1,263	1,490
<b>Total Equity</b>	<b>16,231</b>	<b>13,916</b>	<b>12,342</b>	<b>10,320</b>	<b>10,004</b>	<b>9,803</b>	<b>9,803</b>	<b>9,543</b>	<b>9,040</b>	<b>9,043</b>	<b>9,149</b>	<b>9,149</b>	<b>9,306</b>
<b>Total Liabilities</b>	<b>39,123</b>	<b>36,205</b>	<b>33,169</b>	<b>31,313</b>	<b>30,933</b>	<b>31,298</b>	<b>31,298</b>	<b>31,072</b>	<b>30,667</b>	<b>31,094</b>	<b>31,555</b>	<b>31,555</b>	<b>32,604</b>
<b>Net Cash</b>	<b>6,996</b>	<b>5,581</b>	<b>4,872</b>	<b>4,197</b>	<b>4,522</b>	<b>4,544</b>	<b>4,544</b>	<b>4,876</b>	<b>4,523</b>	<b>4,884</b>	<b>4,863</b>	<b>4,863</b>	<b>7,028</b>
<b>Net Cash per share</b>	<b>1.89</b>	<b>1.50</b>	<b>1.31</b>	<b>1.13</b>	<b>1.22</b>	<b>1.22</b>	<b>1.22</b>	<b>1.31</b>	<b>1.22</b>	<b>1.32</b>	<b>1.31</b>	<b>1.31</b>	<b>1.89</b>
<b>Debtor Days</b>	<b>65.1</b>	<b>67.8</b>	<b>75.9</b>	<b>71.9</b>	<b>75.9</b>	<b>71.9</b>	<b>77.1</b>	<b>80.0</b>	<b>81.0</b>	<b>82.0</b>	<b>83.0</b>	<b>90.3</b>	<b>88.1</b>
<b>Creditor Days</b>	<b>75.2</b>	<b>73.9</b>	<b>-78.3</b>	<b>-71.9</b>	<b>-74.9</b>	<b>-70.9</b>	<b>75.1</b>	<b>-78.3</b>	<b>-71.9</b>	<b>-74.9</b>	<b>-70.9</b>	<b>76.0</b>	<b>74.6</b>
<b>Inventory Days</b>	<b>31.1</b>	<b>30.4</b>	<b>160.9</b>	<b>136.0</b>	<b>146.3</b>	<b>134.3</b>	<b>35.7</b>	<b>158.3</b>	<b>134.3</b>	<b>146.3</b>	<b>134.3</b>	<b>36.0</b>	<b>35.4</b>
<b>Working Capital</b>	<b>3,992</b>	<b>3,979</b>	<b>3,899</b>	<b>3,540</b>	<b>3,659</b>	<b>3,921</b>	<b>3,921</b>	<b>3,830</b>	<b>4,168</b>	<b>4,294</b>	<b>4,888</b>	<b>4,888</b>	<b>4,776</b>
<b>Change In Working Capital</b>	<b>-904</b>	<b>-13</b>	<b>-241</b>	<b>-1,110</b>	<b>-499</b>	<b>-58</b>	<b>-58</b>					<b>967</b>	<b>-112</b>
<b>Working Capital As a % of Sales</b>	<b>9.4%</b>	<b>10.3%</b>	<b>53.0%</b>	<b>46.9%</b>	<b>52.3%</b>	<b>49.0%</b>	<b>13.1%</b>	<b>56.2%</b>	<b>57.8%</b>	<b>59.2%</b>	<b>61.4%</b>	<b>16.7%</b>	<b>16.3%</b>

Nokia - Cash Flow Statement (Euro in millions)													
Financial year ended December 31 (EUR m)	2010	2011	1Q12	2Q12	3Q12E	4Q12E	2012E	1Q13E	2Q13E	3Q13E	4Q13E	2013E	2014E
<b>Operating income</b>	<b>2,070</b>	<b>-1,164</b>	<b>-929</b>	<b>-1,410</b>	<b>-438</b>	<b>-322</b>	<b>-3,098</b>	<b>-353</b>	<b>-190</b>	<b>-19</b>	<b>78</b>	<b>-484</b>	<b>203</b>
Depreciation	808	728	167	157	181	174	679	169	164	158	155	646	604
Amortisation	963	834	206	195	194	194	789	194	194	194	194	776	776
Net interest & Associates	223	199	0	0	0	0	0	0	0	0	0	0	0
Tax paid	-905	-718	-180	-116	0	0	-296	0	0	0	0	0	0
Change in Inventories	-658	193	-15	219	57	-87	173	-34	236	-174	14	42	51
Change in Receivables	411	389	1,048	170	139	-491	866	340	-422	-124	-714	-920	168
Change in Payables	1,151	-569	-953	-30	-315	316	-982	-215	-152	173	105	-88	-107
Other changes in working capital	711	1,569	-214	146	250	250	432	250	250	250	250	1,000	1,000
<b>Cash flow from operations</b>	<b>4,774</b>	<b>1,137</b>	<b>-590</b>	<b>102</b>	<b>190</b>	<b>155</b>	<b>-143</b>	<b>444</b>	<b>137</b>	<b>481</b>	<b>110</b>	<b>1,172</b>	<b>3,019</b>
Acquisitions	-110	-817	51	13	0	0	64	0	0	0	0	0	0
Capex	-679	-597	-132	-115	-115	-132	-495	-112	-119	-120	-131	-482	-483
Capitalised R&D	0	0	0	0	0	0	0	0	0	0	0	0	0
Disposal of fixed assets & businesses	578	1,259	-51	28	0	0	-23	0	0	0	0	0	0
Net proceeds from sale of other assets	-2,212	1,654	601	386	0	0	987	0	0	0	0	0	0
Other	1	0	0	0	0	0	0	0	0	0	0	0	0
<b>Investing cash flows</b>	<b>-2,421</b>	<b>1,499</b>	<b>469</b>	<b>312</b>	<b>-115</b>	<b>-132</b>	<b>533</b>	<b>-112</b>	<b>-119</b>	<b>-120</b>	<b>-131</b>	<b>-482</b>	<b>-483</b>
Dividends	-1,519	-1,536	-6	-743	0	0	-749	0	-371	0	0	-371	-371
Share issuance	0	546	0	0	0	0	0	0	0	0	0	0	0
Share buy-backs	1	0	0	0	0	0	0	0	0	0	0	0	0
Debt issuance	607	-109	-394	203	250	0	59	0	0	0	0	0	0
Other	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>Financing cash flows</b>	<b>-911</b>	<b>-1,099</b>	<b>-400</b>	<b>-540</b>	<b>250</b>	<b>0</b>	<b>-690</b>	<b>0</b>	<b>-371</b>	<b>0</b>	<b>0</b>	<b>-371</b>	<b>-371</b>
Foreign exchange adjustment	224	107	23	74	0	0	97	0	0	0	0	0	0
Other	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>Net cash inflow / outflow</b>	<b>1,666</b>	<b>1,644</b>	<b>-498</b>	<b>-52</b>	<b>325</b>	<b>22</b>	<b>-203</b>	<b>332</b>	<b>-353</b>	<b>361</b>	<b>-21</b>	<b>319</b>	<b>2,165</b>
Opening cash and cash equivalents	5,926	7,592	9,236	8,738	8,686	9,011	9,236	9,033	9,365	9,012	9,373	9,033	9,352
<b>Closing cash and cash equivalents</b>	<b>7,592</b>	<b>9,236</b>	<b>8,738</b>	<b>8,686</b>	<b>9,011</b>	<b>9,033</b>	<b>9,033</b>	<b>9,365</b>	<b>9,012</b>	<b>9,373</b>	<b>9,352</b>	<b>9,352</b>	<b>11,517</b>
<b>Free Cash Flow</b>	<b>4,095</b>	<b>540</b>	<b>-722</b>	<b>-13</b>	<b>75</b>	<b>22</b>	<b>-638</b>	<b>332</b>	<b>18</b>	<b>361</b>	<b>-21</b>	<b>690</b>	<b>2,536</b>
<b>FCF / EBITDA</b>	<b>102.1%</b>	<b>21.2%</b>	<b>776.3%</b>	<b>7.6%</b>	<b>-59.4%</b>	<b>23.7%</b>	<b>216.2%</b>	<b>-1151.4%</b>	<b>7.9%</b>	<b>72.1%</b>	<b>-3.0%</b>	<b>49.0%</b>	<b>103.5%</b>

Source: Citi Research

## Global Comparable Valuations

The follow pages are a summary of comparable global valuations. Citi Research has a detailed Global Eye on Technology global valuation detailed file which is distributed to clients weekly on each Monday. If you would like to be included on this more detailed global valuation distribution list please contact your Citi representative.

Figure 1. Comparable Valuation Tables (Handsets and Tech Hardware)

Company Name	Ticker	Rating	Price in local currency 5-Oct-12	Mkt Cap (US\$M)	Net Cash Per Share	Price/Net Cash	Dividend Yield	P/E (x)				Earnings Growth				EV/Sales (x)				EV/EBITDA (x)				EBIT Margin				Analyst	
								2010	2011	2012E	2013E	2010	2011	2012E	2013E	2010	2011	2012E	2013E	2010	2011	2012E	2013E	2010	2011	2012E	2013E		
								2010	2011	2012	2013	2010	2011	2012	2013	2010	2011	2012	2013	2010	2011	2012	2013	2010	2011	2012	2013		
S&P 500	SP5		1,466.49					21.4	28.7	19.2	19.7					3.1	2.6	2.5	2.3										
Handsets																													
North America																													
Apple Inc	AAPL	n/a	652.59	611,742	\$27.68	23.57	0%	35.6	20.5	14.0	11.8	114.8%	74.2%	46.3%	18.6%	7.4	4.9	3.1	2.3		14.2	8.2	6.2	29.3%	32.6%	35.1%	34.5%	Not Covered	
Rsch In Motion	RIMM	3H	8.22	4,309	\$3.94	2.09	0%	1.4	1.8			42%	-24%	n/a	n/a	0.1	0.1	0.2	0.3	0.3	0.4	2.3		23.4%	23.3%	14.8%	-9.7%	Jim Suva, CPA	
Asia																													
HTC	2498.TW	3	289.50	8,422	\$3.24	89.38	4%	6.8	4.0	12.3	16.5	85%	68%	-67%	-25%	0.7	0.3	0.5	0.7	4.1	2.0	5.6	7.5	15.8%	14.8%	7.6%	6.6%	Kevin Chang	
Europe																													
Nokia	NOK	2H	2.04	9,936	\$2.13	0.96	5%	3.3	6.6			-12%	-50%	n/a	n/a	0.0	0.0	0.1	0.1	0.4	1.4		2.0	7.6%	4.7%	-3.3%	2.6%	Jim Suva, CPA	
AVERAGE					9.2	29.0	0.0	11.8	8.2	13.2	14.1					2.0	1.3	1.0	0.8	1.6	4.5	5.4	5.2						
MEDIAN					3.9	23.6	0.0	6.8	6.6	13.2	14.1					0.7	0.3	0.5	0.7	1.0	2.0	5.5	5.7						
US Tech Hardware																													
IBM	IBM	1	210.59	240,657	(\$11.69)	(18.02)	1%	18.0	15.7	13.9	11.8	17%	15%	12%	18%	2.4	2.3	2.4	2.2	10.6	9.7	9.3	8.1	18.3%	19.5%	21.1%	23.3%	Jim Suva, CPA & Ashwin Shirvaikar, CFA	
Hewlett-Packard	HPQ	3	14.73	28,962	(\$7.38)	(1.99)	4%	3.0	3.3	3.7	4.4	17%	2%	-17%	-14%	0.3	0.3	0.4	0.3	1.8	2.3	2.8	2.9	11.4%	10.8%	9.2%	8.1%	Jim Suva, CPA	
Apple Inc	AAPL	n/a	652.59	611,742	\$27.68	23.57	0%	35.6	20.5	14.0	11.8	114.8%	74.2%	46.3%	18.6%	7.4	4.9	3.1	2.3		14.2	8.2	6.2	29.3%	32.6%	35.1%	34.5%	Not Covered	
Dell Inc	DELL	3	9.66	16,756	\$3.46	2.79	3%	6.1	4.5	5.5	6.1	51%	35%	-15%	-11%	0.1	0.1	0.2	0.2	1.7	1.3	1.7	2.1	5.3%	6.7%	8.3%	7.1%	Jim Suva, CPA	
Xerox Corp	XRXX	2	7.27	9,503	(\$5.20)	(1.40)	2%	7.7	6.7	6.9	6.6	58%	15%	-2%	4%	0.5	0.5	0.5	0.5	3.4	3.4	3.6	3.5	9.6%	9.8%	9.4%	9.0%	Jim Suva, CPA	
Lexmark Intl	LKXX	3	21.55	1,515	\$8.62	2.50	6%	4.3	4.6	6.0	6.2	53%	-5%	-23%	-4%	0.2	0.2	0.3	0.3	1.2	1.4	1.6	1.9	12.3%	12.0%	9.9%	10.2%	Jim Suva, CPA	
Electronics Imag	EFII	2	17.08	795	\$4.02	4.25	0%	28.8	15.4	14.2	12.5	n/a	89%	8%	14%	1.0	0.9	0.8	0.7	9.2	5.8	5.0	4.3	7.1%	11.7%	11.5%	12.0%	Jim Suva, CPA	
EMC Corp	EMC	2	27.29	57,274	\$2.52	10.83	0%	21.6	18.0	16.1	14.3	40%	20%	12%	13%	3.0	2.6	2.3	2.0	13.1	10.2	9.1	8.2	22.0%	23.9%	24.2%	24.7%	Jim Suva, CPA	
NetApp	NTAP	2	30.59	11,114	\$14.10	2.17	0%	15.1	13.1	14.6	13.3	40%	20%	-6%	3%	1.7	1.2	1.1	1.0	9.5	6.9	7.4	7.0	16.1%	19.3%	17.8%	14.4%	Jim Suva, CPA	
Western Digital	WDC	1	37.99	9,315	\$4.82	7.89	3%	8.2	6.4	4.3	4.1	7%	28%	48%	5%	0.7	0.6	0.5	0.4	3.9	2.9	2.2	1.9	15.8%	8.7%	18.2%	16.0%	Joe Yoo	
Seagate Tech	STX	1	29.59	11,601	(\$1.74)	(16.96)	5%	12.7	7.5	4.4	4.2	51%	68%	70%	5%	1.1	0.9	0.8	0.8	5.6	4.2	3.2	3.6	16.7%	7.5%	21.7%	18.7%	Joe Yoo	
Brocade Comm	BRCD	n/a	6.03	2,766	(\$0.80)	(7.52)	0%	10.5	11.6	9.6	9.8	65%	-9.3%	20.1%	-2.1%	1.6	1.5	1.2	1.1		6.5	5.0	4.7	20.5%	17.9%	19.5%	19.1%	Not Covered	
QLogic	QLGC	n/a	10.59	998	\$5.71	1.86	0%	7.5	7.4	10.5	10.3	34.1%	1.4%	-29.0%	1.5%	1.4	1.1	0.9	1.4		3.1	3.3	5.1	29.2%	29.3%	22.3%	21.2%	Not Covered	
Emulex Corp	ELX	n/a	7.05	629	\$2.25	3.13	0%	11.2	10.1	8.8	8.9	-4.7%	11.5%	14.0%	-0.6%	2.1	1.0	0.9	0.8		5.9	4.2	4.0	12.1%	13.6%	16.0%	15.4%	Not Covered	
Motorola Solutions Inc.	MSI	2	51.32	14,693	\$6.23	8.24	2%	27.8	19.7	17.1	14.8	34%	42%	15%	16%	1.3	1.3	1.3	1.4	8.5	7.2	7.9	7.6	14.0%	16.7%	17.0%	17.8%	Jim Suva, CPA	
Corning Inc	GLW	2	13.30	19,804	\$2.05	6.48	3%	6.4	7.6	10.8	10.4	54%	-15%	-30%	4%	1.9	1.5	1.5	1.3	5.5	4.2	4.9	4.5	22.2%	23.1%	17.3%	16.9%	Jim Suva, CPA	
AVERAGE								14.0	10.7	10.0	9.3	38%	25%	8%	4%	1.7	1.3	1.1	1.0	6.2	5.6	5.0	4.7	16%	16%	17%	17%		
MEDIAN								10.8	8.8	10.0	10.1	40%	17%	10%	4%	1.4	1.1	0.9	0.9	5.6	5.0	4.6	4.4	16%	15%	18%	16%		
IT Services																													
Automatic Data	ADP	2	59.53	28,832	\$3.18	18.70	3%	24.3	22.7	21.0	19.2	3%	7%	8%	9%	2.9	2.7	2.5	2.3	12.9	12.3	11.6	10.8	19.7%	18.4%	18.3%	18.3%	Ashwin Shirvaikar, CFA	
Accenture	ACN.US	1	70.74	49,006	\$9.25	7.64	2%	24.3	20.0	17.8	16.0	8%	22%	12%	11%	2.0	1.7	1.5	1.4	12.7	10.8	9.7	8.9	13.5%	13.6%	13.9%	14.1%	Ashwin Shirvaikar, CFA	
Infosys	INFY.IN	1	2,527.90	27,915	\$7.21	350.46	2%	19.1	16.3	16.4	14.5	14%	17%	-1%	13%	4.2	3.4	3.2	2.7	12.8	10.7	10.6	9.1	30.6%	29.5%	29.0%	27.1%	Surendra Goyal, CFA	
Tata Consult	TCS.IN	2	1,303.75	49,313	\$0.72	1,806.31	1%	27.3	22.6	20.3	17.4	35%	21%	11%	17%	6.1	4.8	4.3	3.6	20.6	16.3	14.7	12.6	26.5%	28.1%	27.6%	27.1%	Surendra Goyal, CFA	
Wipro	WIPR.IN	1	373.80	17,777	\$0.78	480.27	2%	15.7	14.9	15.1	13.0	23%	5%	-1%	16%	2.6	2.2	2.1	1.7	11.9	10.7	10.5	9.0	18.9%	18.6%	17.2%	17.0%	Surendra Goyal, CFA	
AVERAGE								22.2	19.3	18.1	16.0	17%	14%	6%	13%	3.6	3.0	2.7	2.3	14.2	12.2	11.4	10.1	22%	22%	21%	21%		
MEDIAN								24.3	20.0	17.8	16.0	14%	17%	8%	13%	2.9	2.7	2.5	2.3	12.8	10.8	10.6	9.1	20%	19%	18%	18%		
Asia and Japan Tech Hardware																													
Acer	2353.TW	3	27.70	2,681	0.45	61.72	1%	5.3		67.8	58.5	39%	n/a	n/a	16%						1.1				2.9%	-1.3%	0.4%	0.4%	Kevin Chang
ASUSTek Computer	2357.TW	2	306.00	7,864	2.32	131.93	6%	59.4	14.0	11.1	11.1	841%	9%	26%	0%	0.4	0.4	0.4	0.4	7.4	7.5	6.5	6.8	4.4%	4.7%	5.0%	4.9%	Kevin Chang	
Catcher Tech	2474.TW	2H	138.00	3,537	1.72	80.28	4%	22.7	9.8	11.0	9.8	37%	131%	-11%	12%	5.1	2.7	2.2	1.8	15.7	6.0	4.8	3.9	23.3%	36.8%	33.9%	32.1%	Wei Chen	
Compal Comm	8078.TW	3H	32.60	676	0.30	109.95	3%			19.8	37.8	n/a	n/a	n/a	-48%	0.8	0.7	0.3	0.3			10.5	14.3	-5.2%	-2.6%	2.0%	1.3%	Jonathan Gu	
Compal	2324.TW	3	24.00	3,615	0.42	57.40	5%	4.8	9.7	11.6	8.5	18%	-49%	-17%	37%	0.1	0.1	0.1	0.0	2.4	2.9	2.7	1.8	2.7%	1.9%	1.7%	1.8%	Wei Chen	
HTC	2498.TW	3	289.50	8,422	\$3.24	89.38	4%	6.8	4.0	12.3	16.5	85%	68%	-67%	-25%	0.7	0.3	0.5	0.7	4.1	2.0	5.6	7.5	15.8%	14.8%	7.6%	6.6%	Kevin Chang	
Largan Precision	3008.TW	3	625.00	2,862	3.05	204.73	2%	22.3	16.2	20.8	17.9	69%	38%	-22%	16%	6.6	4.6	4.6	3.8	15.2	11.7	12.1	10.1	37.7%	34.2%	30.5%	30.3%	Kevin Chang	
Lenovo Grp	0992.HK	1	6.55	8,688	36.44	0.18	2%	32.7	20.0	14.8	11.3	443%	69%	35%	32%	0.2	0.1	0.0	0.0	7.6	3.6	1.5	0.6	1.3%	1.8%	2.0%	2.3%	Wei Chen	
Pegatron	4938.TW	1	38.70	2,981	0.38	102.36	2%	15.3	786.6	18.5	9.2	-2%	-98%	4152%	100%	0.2	0.1	0.1	0.1	4.4	7.3	4.6	3.2	1.6%	0.2%	1.1%	1.3%	Wei Chen	
Quanta	2382.TW	3	73.80	9,695	3.34	22.12	6%	16.3	12.3	12.0	11.1	-14%	33%	3%	8%	0.2	0.3	0.2	0.2	12.6	12.6	11.9	7.9	14.6%	14.1%	1.3%	1.6%	Jonathan Gu	
Stiltech Tech	3311.TW	3	56.30	355	0.86	65.59	6%	7.5	7.8	11.3	10.3	24%	-4%	-31%	11%	0.6	0.5	0.8	0.6	3.2	3.1	4.7	4.1	13.6%	12.1%	10.9%	10.1%	Jonathan Gu	
Canon	7751.JP	1	2,459.00	36,118	8.23	298.67	5%	13.7	12.2	11.6	9.4	101%	12%	5%	24%	0.5	0.5	0.4	0.4	2.9	2.5	2.6	2.2	10.5%	10.6%	10.3%	12.0%	Masahiro Shibano	
Nikon	7771.JP	2	1,939.00	9,797	2.12	916.07	2%	49.1	15.2	12.1	9.9	n/a	223%	25%	23%	0.8	0.6	0.6	0.5	9.6	5.5	4.7	4.0	-1.8%	6.1%	8.7%	8.8%	Masahiro Shibano	
Ricoh	7752.JP	1	732.00	6,763	(6.02)	(121.55)	3%	21.7		37.8	8.5	3%	n/a	n/a	346%	0.1	0.1	0.1	0.1	1.0	2.4	2.1	1.4	3.3%	3.1%	-0.9%	3.7%	Masahiro Shibano	
AVERAGE								18.1	82.5	19.5	16.4	137%	39%	372%	39%	1.2	0.8	0.8	0.7	7.2	5.3	5.7	5.2	8%	9%	8%	8%		
MEDIAN								16.3	12.3	12.2	10.7	38%	33%	3%	16%	0.5	0.4	0.4	0.4	5.9	3.6	4.7	4.0	3%	4%	4%	4%		
US Tech																													
Intel	INTC	2	22.68	113,468	\$1.26	17.99	4%	11.3	9.5	10.9	10.6	93%	19%	-13%	3%	2.1	1.8	2.0	2.0	6.0	5.6	7.1	7.5	35.7%	32.4%	27.9%	27.1%	Glen Young	
Cisco Systems	CSCO	1	18.86	100,004	\$4.73	3.99	3%	11.7	10.9	9.9	9.2	11%	6%	11%	8%	1.8	1.6	1.4	1.2	6.6	6.0	5.1	4.4	29.2%	26.2%	27.7%	27.4%	Kevin J Dennehan, CFA	
Oracle Corp	ORCL	1	31.39	151,270	\$3.66	8.57	1%	15.7	13.3	12.1	10																		

Figure 2. Comparable Valuation Tables (Tech Supply Chain)

Company Name	Ticker	Rating	Price in local currency 5-Oct-12	Mkt Cap (US\$M)	Net Cash Per Share	Price/Net Cash	Dividend Yield	P/E (x)				Earnings Growth				EV/Sales (x)				EV/EBITDA (x)				EBIT Margin				Analyst
								2010	2011	2012E	2013E	2010	2011	2012E	2013E	2010	2011	2012E	2013E	2010	2011	2012E	2013E	2010	2011	2012E	2013E	
								2010	2011	2012	2013	2010	2011	2012	2013	2010	2011	2012	2013	2010	2011	2012	2013	2010	2011	2012	2013	
S&P 500								SP5	1,466.49		21.4	28.7	19.2	19.7					3.1	2.6	2.5	2.3						
Technology Supply Chain																												
Components Distributors																												
Arrow Electronic	ARW	1	34.90	3,797	(\$14.57)	(2.40)	0%	8.4	6.7	7.7	6.9	147%	25%	-13%	11%	0.2	0.2	0.3	0.2	5.1	4.8	5.6	4.9	4.2%	4.5%	4.0%	4.2%	Jim Suva, CPA
Avnet Inc	AVT	1	29.15	4,084	(\$1.81)	(16.14)	0%	7.9	6.7	7.3	6.5	51%	18%	0%	8%	0.2	0.2	0.2	0.2	4.8	4.5	4.7	4.4	3.4%	3.8%	3.7%	3.8%	Jim Suva, CPA
WPG Hldgs	3702.TW	3	39.40	2,227	\$0.09	429.15	6%	10.3	12.3	13.5	13.0	37%	-17%	-9%	4%	0.3	0.3	0.3	0.3	13.6	12.8	14.1	14.1	2.3%	2.0%	1.8%	1.7%	Roland Shu
AVERAGE								8.9	8.6	9.5	8.8	78%	9%	NM	8%	0.3	0.2	0.2	0.2	7.8	7.3	8.1	7.8	3%	3%	3%	3%	
MEDIAN								8.4	6.7	7.7	6.9	51%	18%	-9%	8%	0.2	0.2	0.3	0.2	5.1	4.8	5.6	4.9	3%	4%	4%	4%	
System Assembly/Non-Components Distributors																												
Ingram Micro Inc	IM	2	15.36	2,305	\$4.29	3.58	0%	8.1	8.9	8.6	8.0	42%	-9%	4%	7%	0.1	0.0	0.0	0.0	3.3	3.5	3.4	2.9	1.4%	1.3%	1.2%	1.3%	Jim Suva, CPA
Synnex Corp	SNX	2	32.77	1,223	\$2.31	14.18	0%	10.0	8.0	8.5	7.9	22%	23%	-5%	8%	0.2	0.2	0.1	0.1	7.1	5.6	5.0	4.1	2.3%	2.5%	2.4%	2.5%	Jim Suva, CPA
Tech Data Corp	TECD	2	44.19	1,668	\$5.73	7.71	0%	10.3	8.8	8.5	7.5	28%	17%	4%	14%	0.0	0.0	0.1	0.1	3.1	3.2	3.3	3.1	1.2%	1.4%	1.3%	1.3%	Jim Suva, CPA
AVERAGE								9.5	8.5	8.5	7.8	31%	10%	1%	10%	0.1	0.1	0.1	0.1	4.5	4.1	3.9	3.4	2%	2%	2%	2%	
MEDIAN								10.0	8.8	8.5	7.9	28%	17%	4%	8%	0.1	0.0	0.1	0.1	3.3	3.5	3.4	3.1	1%	1%	1%	1%	
Electronics Manufacturing Services (EMS)																												
Benchmark Elec	BHE	3	15.66	879	\$4.73	3.31	0%	11.4	15.5	12.7	10.2	51%	-27%	22%	25%	0.2	0.2	0.2	0.2	3.2	6.0	4.2	3.8	4.0%	2.2%	3.6%	4.0%	Jim Suva, CPA
Celestica Inc	CLS	3	7.17	1,641	\$2.97	2.41	0%	8.3	6.8	7.9	7.1	34%	22%	-14%	12%	0.1	0.1	0.1	0.1	2.6	2.7	3.0	2.9	3.4%	3.6%	3.2%	3.5%	Jim Suva, CPA
Flextronics Intl	FLEX	2	6.11	4,066	(\$1.05)	(5.82)	0%	7.5	7.5	6.5	5.6	35%	9%	9%	17%	0.2	0.2	0.2	0.2	3.6	3.8	3.8	3.5	2.5%	2.9%	2.3%	3.1%	Jim Suva, CPA
Jabil Circuit	JBL	2	18.05	3,709	(\$2.09)	(8.63)	2%	9.9	7.6	7.8	6.8	91%	31%	3%	6%	0.3	0.2	0.2	0.2	4.6	3.7	3.5	3.1	3.7%	4.3%	4.3%	4.4%	Jim Suva, CPA
Plexus Corp	PLXS	2	30.22	1,057	\$0.48	63.12	0%	12.8	13.7	12.1	11.0	42%	6%	5%	13%	0.5	0.5	0.4	0.4	6.9	6.8	6.4	5.6	4.8%	4.5%	4.5%	4.8%	Jim Suva, CPA
Sanmina-SCI	SANM	2H	8.10	661	(\$6.52)	(1.24)	0%	5.3	5.5	6.3	4.9	n/a	9%	-16%	30%	0.2	0.2	0.2	0.1	3.6	3.4	3.6	2.9	3.5%	4.9%	3.9%	3.3%	Jim Suva, CPA
AVERAGE								9.2	9.4	8.9	7.6	51%	8%	1%	17%	0.2	0.2	0.2	0.2	4.1	4.4	4.1	3.6	4%	4%	4%	4%	
MEDIAN								9.1	7.5	7.9	6.9	42%	9%	4%	15%	0.2	0.2	0.2	0.2	3.6	3.7	3.7	3.3	4%	4%	4%	4%	
Components/Connectors																												
Amphenol Corp	APH	1	58.76	9,460	(\$4.11)	(14.28)	1%	21.7	19.3	17.2	15.1	47%	12%	12%	14%	2.7	2.5	2.3	2.1	12.0	11.2	10.6	9.2	19.7%	19.2%	19.3%	19.9%	Jim Suva, CPA
Molex	MOLX	2	26.19	4,232	\$2.82	9.29	3%	16.6	15.5	16.5	14.2	104%	17%	-2%	11%	1.2	1.1	1.0	0.9	6.3	5.6	5.5	4.9	9.4%	12.4%	11.8%	11.5%	Jim Suva, CPA
TE Connectivity	TEL	1	34.20	14,631	(\$3.23)	(10.60)	2%	15.6	12.3	11.4	10.3	97%	21%	8%	13%	1.1	1.0	1.1	1.0	6.8	6.1	6.1	5.4	12.3%	12.5%	13.2%	14.1%	Jim Suva, CPA
Sensata Techn HI	ST	2	29.22	5,190	(\$8.55)	(3.42)	0%	16.5	14.9	14.4	12.3	127%	11%	3%	17%	4.6	3.7	3.5	3.0	24.6	23.0	17.0	13.2	26.9%	24.7%	25.2%	26.2%	Jim Suva, CPA
AVX	AVX	2	9.64	1,632	\$4.94	1.95	3%	7.2	7.0	12.8	13.0	67%	-4%	-34%	-11%	0.4	0.4	0.3	0.3	2.0	1.8	2.2	2.0	12.9%	20.0%	17.8%	11.2%	Jim Suva, CPA
Vishay Intertech	VSH	2	9.61	1,377	\$3.05	3.15	0%	6.1	6.6	9.9	8.1	8323%	-9%	-33%	22%	0.3	0.3	0.2	0.2	1.4	1.2	1.4	1.3	15.3%	13.6%	10.0%	10.9%	Jim Suva, CPA
Intl Rectifier	IRF	2	16.27	1,125	\$5.35	3.04		10.3	13.9			n/a	-20%	n/a	n/a	0.5	0.6	0.7	0.7	3.4	4.0	8.8	7.2	2.2%	12.3%	-0.4%	-2.7%	Terence Whalen
Fairchild Semi	FCS	1	12.97	1,643	\$0.79	16.44	0%	8.8	10.3	22.1	12.3	12929%	-15%	-53%	79%	1.0	0.9	1.0	0.9	4.5	4.7	7.2	5.2	12.7%	10.8%	5.0%	9.4%	Terence Whalen
ON Semi	OMNN	2	6.16	2,806	(\$0.11)	(57.99)	0%	6.9	7.0	11.5	8.8	157%	-1%	-40%	31%	1.4	0.9	1.1	1.0	5.2	6.2	5.8	4.7	19.1%	13.4%	9.9%	12.5%	Terence Whalen
AVERAGE								12.2	11.9	14.5	11.8	2731%	1%	NM	22%	1.5	1.3	1.2	1.1	7.4	7.1	7.2	5.9	15%	15%	12%	13%	
MEDIAN								10.3	12.3	13.6	12.3	115%	-1%	-18%	16%	1.1	0.9	1.0	0.9	5.2	5.6	6.1	5.2	13%	13%	12%	11%	

Source: Citi Research and ThomsonOne , Note: Pricing is as of mid day Oct 5

## Company Descriptions, Investment Strategy, Valuation and Risks

### International Business Machines Corp

#### Company description

IBM is the world's largest enterprise IT company and is a significant player in virtually every major segment of the enterprise market, including services, servers, storage, software, and semiconductors. The company generated almost \$107B revenue in 2011 and has led the world in the number of US patents granted for more than a decade. Revenue categories include Global Services, Hardware, Software, and Global Financing, which were 56%, 18%, 23%, and 2% of 2011 total revenue, respectively. The same categories showed 33%, 40%, 89%, and 50% gross margins, respectively, with an aggregate gross margin of 47%. IBM operates labs around the world and its R&D expense in 2011 was \$6.3 billion as the company continues to innovate and evolve for future enterprise needs.

#### Investment strategy

We rate IBM with a Buy rating and a 12-month target of \$250, as we believe it is one of the most compelling long-term investments within Technology Hardware. IBM is uniquely positioned within the major IT vendors given its arguably best-in-class portfolio of products and services and to embrace BYOD. On hardware, IBM essentially has a monopoly within mainframes which remain superior to x-86 servers in terms of reliability, utilization, security and throughput which will see an upgrade in 2013. IBM's software portfolio, highlighted by its middleware, allows the company to provide superior integration and manageability of the customer's datacenter. IBM's services platform (consulting, BPO, IT outsourcing) allows IBM to offer a turnkey solutions to customer & also a channel to sell its products. The combination of these assets makes IBM arguably the most compelling end-to-end solutions provider in areas such as infrastructure roll-out, system integration, IT outsourcing & BYOD. From a financial perspective, the company is the only company within our universe that sets a 5-year EPS target, which is a testament to its earnings visibility (60-70% of revenues are recurring), as well as the ability to generate earnings growth via a combination of several levers which include organic growth, acquisitions, share repurchases, margin expansion, and productivity gain. Our estimates may prove to be conservative if the following occurs: 1) a meaningful pick-up in short-term consulting deals, which generally occurs with a macro recovery, 2) a potential refresh of the z-Series & IBM shares have generally performed well during the initial stages of the mainframe cycle given the earnings pick up (Roughly 30-35% of IBM's revenues are related to the mainframe business), 3) faster-than-expected share repurchases.

#### Valuation

Our target price of \$250 is based on 13x forward 12 month EPS estimates 12 months from now. During the past 20 years, we find that IBM shares have traded at a mean multiple of 19X F12 EPS, but this includes periods of significantly higher sales growth which were double digit growth as well as some periods of significant financial distress for IBM in the late 1980s and early 1990s. Since 1997, the shares have traded in a core range of 16-20X F12 EPS, excluding unusual periods during the Internet bubble and subsequent economic downturn. Given medium to long-



term potential for single-digit revenue and double-digit EPS growth, good earnings visibility, tempered by the reality that share repurchase and acquisitions drive a substantial amount of IBM's EPS growth, we believe that IBM shares should trade more in line with the current market multiple at 13x compared to the >60% premium during the two decades. We also believe this lower than historical multiple reflects a deceleration in sales growth stemming from various macro headwinds and general multiple compression across the tech universe. Consequently, we are using a 13x multiple (in line with the S&P). Applying 13x to our F12 month EPS 12 months from now of \$19.26 suggests a 12-month target price of \$250.

## Risks

1) Any meaningful slowdown in infrastructure roll-out in emerging markets given that it has been a key driver of IBM's revenue growth (and mainframe adoption), 2) material drop in long-term Services signings as it has an eventual impact to Services revenues, 3) muted adoption of the pending new zSeries mainframes, 4) potential share loss (or slower growth) in the key branded Middleware segment, which could limit the expectation of positive mix shift.

More than half of the company's pretax income is derived from annuity-like sources such as IT outsourcing, maintenance, software, and financing, contributing to a high degree of EPS predictability. Market cap, liquidity, and a solid balance sheet also pose somewhat limited risk. That said, roughly half of Services revenues is transactional and short-term oriented in nature, and can be vulnerable during period of macro weakness. Within the Systems and Technology segment, the company derives close to 28% of its revenues from the highly competitive x-86 market, and another 15-20% comes from Microelectronics and Tape, which generally lacks growth. Within software, a significant portion is tied to the mainframe which has seen more and more competition from x86 platforms.

If the negative impact on the company from any of these factors proves to be greater than we anticipate, the stock will likely have difficulty achieving our target price.

## Dell Inc

### Company description

Founded in 1984 by Michael Dell, Dell Inc is one of the largest IT hardware vendors globally and distinguishes itself from competitors with its direct customer model. The company offers both preconfigured and build-to-order computers and, in CY11, claimed 12% worldwide market share in PCs. In FY12 (ending Jan 2012), sales of notebooks and desktops accounted for 31% and 21% of Dell's worldwide revenues, respectively. Additional business lines include Enterprise (workstations, servers & storage) at 19% of total revenues; Software & Peripherals (software, Dell-branded printers, consumables, TVs/displays & PC components) at 16% of total revenues; and Services at 13% of total revenues. For the same period, 30% of total revenues derived from Large Enterprise customers, 27% from Public, 24% from SMB, and 19% from Consumer. In FY12, Dell's gross margin was 22.8% and op margin was 8.3%.

### Investment strategy

We rate Dell shares Sell as we believe BYOD trends in the corporate PC segment will materially pressure Dell's sales, margins and EPS in the future. Accordingly we

are at least 15% below consensus EPS estimates for 2013 as we see Lenovo and others more aggressively eroding Dell's market share. Our Sell rating is non consensus as 94% of consensus has a buy or hold rating on Dell shares.

## Valuation

Our target price of \$8.50 is based on 5-6x F12-month EPS 12 months from now of \$1.53 which is in line with the current PE multiple. Our target is mainly based on our below-consensus EPS estimates (13% below the street's FY14 estimate) given our more cautious stance on the overall PC market (Citi is forecasting a 1% yoy unit decline in CY13) as well as further share loss. Our Sell recommendation is a contrarian call given the current sell-side ratings distribution (5% sell ratings).

## Risks

The primary risks to our target price include the following: 1) Dell could launch appealing tablets which could gain widespread enterprise adoption while posting strong profitability (currently Apple is the only company gaining material tablet traction while posting strong profitability). 2) Competition from Lenovo, HP, Apple, Samsung and others may not be as intense as we expect. 3) The economy could materially improve thereby driving a hiring frenzy where new employees may need new computers. 4) BYOD for enterprise PC could be slowed if there are security breaches in the Citrix, RSA, and remote log in connectivity methods. 5) Dell could more aggressively repurchase stock to help buffer the EPS decline. 6) Dell could make accretive acquisitions especially in the highly fragmented software sector which would boost EPS.

## Hewlett-Packard Co

### Company description

Hewlett-Packard is a leading vendor of IT hardware (currently #1 in PCs), imaging solutions, and services worldwide. As of FY11 HP has five major business segments: 1) Imaging & Printing Group (IPG; approx 20% of total revs; 15% op margin) provides laser and inkjet printers, supplies, multifunction and photo printers, wide/large-format printers, digital cameras and accessories, online photo services (through Snapfish), and imaging & software solutions and related professional & consulting services. 2) Personal Systems Group (PSG; approx 31% of total revs; 6% op margin) provides computing systems for the enterprise, SMB and consumers, including PCs & workstations, handhelds, digital entertainment systems, calculators, and software & related services. 3) Enterprise Servers and Storage (ESS; approx. 17% of total revs; 14% op margin). 4) Software (3% of total revs; 22% op margin) which includes enterprise software to manage data centers and the Mercury Interactive acquisition. 5) Services (28% of total revs; 14% op margin) include technology services, consulting, integration, managed services, as well as the EDS acquisition.

### Investment strategy

We rate shares of HPQ Sell. We believe consensus EPS estimate are too aggressive for both 2013 and 2014. We believe the company is too optimistic in its PC & printing forecast of flat to up 1% through 2015 as we are concerned Lenovo will surpass HP as the #1 PC market share company and pressure HP's margins. We also fear HP will continue to lose more services opportunities given its heavy restructuring and management turnover. We see Lenovo aggressively moving into

HP's market. We note the stock is one of the worse IT hardware performing stocks in 2012 with investor sentiment quite negative with short interest at all time levels so the sell rating may take a while for the stock keep going lower.

## Valuation

Our target price of \$13.50 is based on 4x F12-month EPS 12 months from now of \$3.42, which is in line with the current PE multiple. We are materially below consensus for 2013 and 2014 given our view that HP will see more competition (Lenovo, Accenture, IBM) and a more challenging economy resulting in greater than expected margin pressure. Historically HP has been able to help boost revenues via acquisitions and help EPS with aggressive stock buy back but we believe both will materially slow given the company's debt structure and need to reinvest into HP core operations. Our Sell recommendation is a contrarian call given the current sell-side ratings distribution (52% hold, 30% buy, 18% sell ratings).

## Risks

Upside risks to HPQ's target price include the following: 1) An announcement to either divest its printer and / or PC segment as we view both as a distraction to management and we believe HP is unwilling to divest this to focus on non commodity storage and services. 2) If HP could fully integrate into an end to end solution its services which currently are a melting pot of acquisitions (took a \$9 billion write off in August 2012) which are not fully intergraded in an end to end solution like IBM. 3) An appealing tablet product portfolio that gains material traction while posting strong profitability (currently Apple is the only company gaining material traction while posting strong profitability). and 4) a meaningful improvement in the demand environment, which could generate a cyclical uplift particularly to the PC and printing businesses.

## EMC Corp

### Company description

EMC Corporation (EMC) has grown from providing memory boards into the early computer market to the world's leading provider of intelligent enterprise infrastructure, with products spanning most every layer of the IT architecture. In addition to being the world's largest storage supplier, EMC is well positioned in such high growth markets as server virtualization, security, content management and network monitoring. The company maintains a controlling interest (~80%) in virtualization software-leader VMware. Based in Hopkinton, MA and founded in 1979, EMC has approximately 53,500 employees globally.

EMC conducts its business through two broad categories: EMC Information Infrastructure (80% of total sales in 2011) & VMware Virtual Infrastructure (20% of total sales in 2011). The company's EMC Information Infrastructure provides a foundation for organizations to store, manage, protect, analyze and secure their vast and ever-increasing quantities of information, improve business agility, lower cost of ownership and enhance their competitive advantage within traditional data centers, virtual data centers and cloud-based IT infrastructures. It operates through three segments: Information Storage, Information Intelligence Group and RSA Information Security. The Information Storage segment offers a comprehensive portfolio of enterprise storage systems and software-scaling from entry-level to datacenter class systems supporting organizations' information storage, back-up and recovery, and management strategies. The Information Intelligence Group

segment provides software and services for enterprise capture, information access, customer communications, case management and governance to help organizations get maximum leverage from their information. The RSA Information Security segment delivers products, packaged solutions and services designed to safeguard the integrity and confidentiality of information throughout its lifecycle. It offers solutions in identity assurance and access control, data loss prevention, encryption and key management, enterprise governance, risk and compliance, security information management and fraud protection. These technologies enable organizations to discover, classify and place appropriate controls around their data, secure access to the data both inside and outside the network as well as across physical, virtual or cloud infrastructures, and monitor and enforce these measures to prove compliance with security policies and regulations. The VMware Virtual Infrastructure business category provides virtualization and cloud infrastructure software solutions. Its solutions enable organizations to aggregate multiple servers, storage infrastructure and networks.

## Investment strategy

We rate shares of EMC Corp Neutral as we view the shares to be fairly valued with limited upside to estimates. While positive secular trends are likely to drive continued demand for EMC's products and services (storage, virtualization and security), we believe macro factors in Europe and recent signs of weakness in Asia as well as high unemployment rates are likely to limit overall IT and storage spending.

## Valuation

Our target price of \$30 is based on 15x F12 month EPS 12 months from now (we are giving EMC and NTAP the same valuation multiples). The shares currently trade at 14.5x Street's F12M EPS estimate, compared to a two-year mean of 15x, a high of 18x and a low of 12x. We note that a peer group of large-cap technology stocks including Microsoft, IBM, H-P, Dell, Intel, Cisco, and Oracle is currently trading in a range of 4x (HPQ) to 13x (IBM) forward twelve month EPS, with a median of 10x. We believe that EMC shares deserve a multiple greater than this range given the favorable growth profile of its end markets and its strong competitive position, offset by the current macro backdrop. Our Neutral stock rating is more conservative than consensus (95% buy, 5% hold, 0% sell).

## Risks

Specific risks that could leave the shares underperforming or outperforming our target price include:

- 1) Impact to overall IT and storage spending given macro factors
- 2) Disruption relative to the market transition to virtualized servers and/or more efficient storage technologies;
- 3) Competition, primarily from emerging companies and technologies, some of which could prove disruptive with impact to pricing; and
- 4) Execution and/or volatility related to the majority-owned VMware

If the impact on the company from any of these factors proves to be greater/less than we anticipate, we believe the stock will likely have difficulty achieving our target price or could outperform it.

## NetApp Inc

### Company description

Founded in 1992, NetApp is a leading provider of networked storage and data management solutions addressing both the SAN and NAS markets, providing unified storage systems that support both FC/iSCSI SAN protocols as well as file-based storage protocols (NFS, CIFS). It provides a broad portfolio of application, cloud, and service provider solutions that help customers streamline operations and lower the costs associated with storing and managing their data. The company pioneered the network attached storage, or NAS, appliance market. The company's products are largely comprised of industry standard hardware components, but leverage a unique operating system and file system (ONTAP), a highly scalable and flexible operating system that concurrently supports any mix of storage area network and network-attached storage environments. NetApp's Data ONTAP operating system provides the foundation to build a shared storage infrastructure and an enterprise-wide data fabric for the full breadth of business applications and data storage and protection requirements. The company's portfolio of efficiency technologies helps its customers reduce their storage spending and get more from the storage assets they already own. Product sales comprised 67% of total revenues in FY2012 while software and services 13% and 20% respectively of total revenues in FY 2012. Based in Sunnyvale CA, NetApp has approximately 12,150 employees globally.

### Investment strategy

We rates shares of NetApp Inc Neutral as we view the shares to be fairly valued with balanced risk/reward. While positive secular trends are likely to drive continued demand for NTAP's storage products and services, we believe macro factors in Europe and recent signs of weakness in Asia as well as high unemployment rates are likely to limit overall IT and storage spending.

### Valuation

Our target price of \$34 is based on 14x F12 month EPS 12 months from now (we are giving NTAP and EMC the same valuation multiples). The shares currently trade at 13x consensus forward twelve month earnings estimate, below their 5 year median of 18.8x, a high of 29.3x and a low of 10.3x. We would note that for much of the trailing two-years, NetApp has been in the "penalty box" given poor execution beginning in the latter part of C2011. While the storage end market offers a favorable growth profile and NTAP is one of the leading vendors in this space, we don't expect the shares to trade back to their median range in the near to mid term given the macro backdrop and the lower margin profile of the company relative to their prior years. Our target multiple of 14x is at a 5% discount to the target multiple we assign to EMC given the lower average rate projected for NTAP vs EMC, over the next 3 years.

### Risks

The stock carries negligible liquidity concerns but has demonstrated earnings volatility which when combined with the above average valuation has translated to stock price volatility.

Specific risks that could cause the stock to outperform/underperform our estimates and/or target price include:

1) Impact to overall IT and storage spending (especially within US Enterprise and Public Sector) given macro factors

2) Disruption relative to the market transition to virtualized servers and/or more efficient storage technologies;

3) Competition: Storage leader EMC is becoming increasingly aggressive in NetApp's core mid-range market, while hardware OEMs are refocusing on their storage businesses. The degree to which these competitors, individually or in aggregate, execute in the market could cause NetApp shares to trade above or below our target price

4) Operating Expense Discipline. NetApp has historically grown headcount alongside revenue. The extent to which the company invests in headcount drives operating expense growth, our operating margin forecast could prove aggressive/conservative based on how the company invests in headcount vs. our estimates.

If the impact on the company from any of these factors proves to be greater/less than we anticipate, we believe the stock will likely have difficulty achieving our target price or could outperform it.

## Ingram Micro Inc

### Company description

Ingram Micro is one of the world's largest IT distributors (by revenue) and competes with Tech Data and Synnex. Ingram Micro operates more than 100 distribution centers worldwide, bringing to market the products of more than 1,300 suppliers. Product categories include networking (10-15% of revenues), software (15-20%), systems (30-35%), and peripherals/other (35-40%). Services offered include marketing, market research, business intelligence, and supply chain services. Ingram Micro's customer base of 190,000 various resellers include VARs (value added resellers), corporate resellers, direct marketers, retailers, Internet-based resellers, and government and education resellers. Fiscal 2011 revenues of \$36.3B were 42% from North America, 31% Europe, 22% APAC, and 5% Latin America. For these same regions, operating margin was 1.9%, 1.2%, 0.6% and 1.4%, respectively, with an overall operating margin of 1.3%. Ingram is based in Santa Ana, CA and employs about 15,500 people.

### Investment strategy

We rate shares of IM Neutral with a 12-month target price of \$17. We view the shares to be fairly valued given that risk/reward seems relatively balanced. The positives are 1) shares are trading below book value, 2) ERP roll-out issues have been contained near-term, 3) accretion from pending Brightpoint acquisition could be significant, and not reflected in street estimates (we believe the integration could be \$0.18/0.35 EPS accretive in CY2013/2014), 4) potential upside from high-margin logistics business. However, this is largely offset by the following negatives, which include 1) lingering macro concerns in Europe, which could result in unexpected drop in revenues and earnings, 2) potential integration hiccups during the integration of Brightpoint, and 3) Asia, which accounts for 22% of revenues, has recently witnessed unsettling signs of softening demand.

## Valuation

Our target price of \$17 is based on 8-9x F12-month EPS 12 months from now, which is the 3-year average PE multiple for the IT Distributors (IM, TECD, SNX). We are also modestly below consensus estimates given a more cautious assumption for FY13 growth (+2% yoy growth vs consensus +3% growth) given a challenging IT demand environment, and potential execution issues, with BYOD and other non PCs items (tablets) gaining traction. Our view on the stock is generally inline with consensus (17% Buy, 75% hold, 8% sell ratings). Tangible book value is \$22.

## Risks

Upside risks to our target price include the following: 1) overall macro environment improves, particularly in Europe, 2) signs that the company is regaining meaningful share in Australia following the ERP hiccup, 3) we see enough evidence that the pending integration of Brightpoint does not pose a meaningful operational risk, 3) shares retreat more than 40% below tangible book (\$22 is current tangible book value), which is generally where the shares have troughed in the past.

Downside risks to our target price include the following: 1) Integration issue with the pending acquisition of Brightpoint, 2) further deterioration of the macro environment and IT demand, 3) additional issues related to future ERP roll-outs which need to resume at some point, 4) further price aggression by competition, especially in Asia-Pacific where IM is trying to regain share, 5) the industry shift to cloud computing begins to meaningfully disintermediate the distribution channel.

## Tech Data Corp

### Company description

Tech Data is the second largest (in terms of revenues) wholesale distributor of IT products, logistics mgmt, and other value-added services worldwide. Its primary competitors include Ingram Micro and Synnex. Tech Data does not sell any products or services directly to end users, but rather it distributes more than 100,000 IT products from 1,500 vendors to approximately 90,000 value-added resellers (VARs), direct marketers, retailers, and corporate resellers that generate demand for the products and manage the end-user relationship. Tech Data also provides services including training and technical support, financing, product configuration, marketing assistance, and e-commerce. In FY12 (ending January 2012), the company generated revenues of \$26.5 billion, and derived over 60% of total revenues from operations outside the United States. Tech Data manages the business in two geographic segments: EMEA and the Americas (U.S., Canada, Latin America, Caribbean), which produced 59% and 41% of FY12 sales, respectively.

### Investment strategy

We rate shares of TECD Neutral. We view the shares to be fairly valued given that risk/rewards seem relatively balanced. The positives are 1) shares are trading below book value, which provides some valuation support, 2) recent ERP roll-out issue was temporary, and should not recur, 3) accretion from purchase of remaining portion of Brightstar JV and SDG distribution assets is meaningful, and not reflected in street estimates. This is largely offset by the following negatives, which include 1) lingering macro concerns in Europe (more than 55% of revs), which could result in unexpected drop in revenues, 2) Ingram Micro's efforts to gain share could pose



pricing and revenue risk, 3) valuation (relative to IM) is less attractive at 1x tangible book value.

## Valuation

Our target price of \$48 is based on 8-9x F12-month EPS 12 months from now, which is the 3-year average PE multiple for the IT Distributors (IM, TECO, SNX). We highlight that we are modestly below consensus estimates given our more modest assumption for FY13 growth (+2% yoy growth vs consensus +3% growth) given a challenging IT demand environment, especially in Europe, with BYOD and other non PCs items (tablets) gaining traction. We are also below the street on GM assumptions given potential price aggression and risk on back-end incentives in case of a volume shortfall. Our view on the stock is relatively in line with consensus (30% buy, 50% hold, 20% sell ratings). Tangible book value is \$45.

## Risks

Upside risks to our target price include the following: 1) overall macro environment improves, particularly in Europe, 2) we see enough evidence that BrightStar does not pose a meaningful operational risk, 3) shares retreat more than 15% below tangible book, which is generally where the shares have troughed in the last 2-3 years.

Downside risks to our target price include the following: 1) further deterioration of the macro environment and IT demand, especially in Europe, 2) additional unexpected issues from the ERP roll-out, which undermines operations and leads to share loss, 3) IM becomes aggressive within the handset distribution business, negatively impacting the BrightStar business.

## Synnex Corp

### Company description

Synnex Corp. is the third-largest wholesale distributor of information technology products in North America behind Ingram Micro and Tech Data. The company distributes 20,000 systems, software, peripheral, networking, and component products from 100 vendors, including Hewlett-Packard (about 35% of total revenue), IBM, and Intel. Synnex sells to more than 20,000 small business resellers, direct marketers, corporate resellers, government resellers, and retailers, but does not sell directly to end users. No one customer represents more than 10% of total revenue, but large customers include CDW, Iron Bow Technologies, Staples Business Depot, Insight Enterprises, Systemax, etc. While traditional wholesale distribution represents 98% of Synnex's total revenue, the company also performs various value-added services (BPO) that include technical support, renewals management, back-office processing, and ITO. During FY11 the company generated revenue of \$10.4B, gross margin of 6.1%, operating margin of 2.5%, and diluted EPS of \$4.11.

### Investment strategy

We rate Synnex shares Neutral. We view the shares to be fairly valued given that risk/reward seems relatively balanced. The positives are 1) SNX has a much better track record in consistent execution, relative to its peers, partly due to its historical focus in a single region (North America), more focused line card, and a home grown ERP system, 2) build out of value-added services (ie. BPO) offers healthy opportunities for margin expansion and earnings growth, and 3) street estimate look relatively conservative. This is largely offset by the following negatives, which

include 1) valuation does not look particularly attractive with the shares trading above tangible book value; shares have troughed at 5-10% below tangible book during last 2-3 years, 2) the recent entry into the Japan market (via the Marubeni acquisition) poses a risk if the regional macro environment deteriorates, 3) relatively high level of exposure to US consumer retail, which remains weaker than corporate, 4) Exposure to HP is disproportionately high at 36% of revs (vs 20-25% for IM and TECD) is a potential risk given the current operational woes of that particular vendor.

## Valuation

Our target price of \$35 is based on 8-9x F12-month EPS 12 months from now, which is the 3-year average PE multiple for the IT Distributors (IM, TECD, SNX). We highlight that we are below consensus estimates given our more modest assumption for FY13 growth (flat yoy growth vs consensus +4% growth) given a challenging IT demand environment, particularly in consumer with BYOD and other non PCs items (tablets) gaining traction. Our view on the stock is relatively inline versus consensus (50% buy, 50% hold ratings). Tangible book value is \$29.

## Risks

Upside risks to our target price include the following 1) overall macro environment improves, particularly in North America, 2) signs that the US consumer market is improving given exposure to that segment, 3) meaningful growth in the Japan IT market and/or meaningful share within that region, 4) faster-than-expected growth or margin recovery in the GBS business, and 5) shares retreat meaningfully below tangible book.

Downside risks to our target price include the following: 1) further deterioration of the macro environment and North American IT demand, 2) further price aggression by larger competitors such as IM and TECD in light of weaker demand, 3) the industry shift to cloud computing begins to meaningfully disintermediate the channel, and 4) slower than expected growth or margin expansion within GBS.

# Xerox Corp

## Company description

Xerox (XRX) is one of the largest global providers of copiers, printers and related supplies, services and financing to Office and Production printing environments, and with its completion of the acquisition of ACS on February 8, 2010, the company is now one of the largest Business Process Outsourcing (BPO) companies in the world.

The company operates through two key segments: Technology (45% of total sales in 2011) and Services (48% of total sales in 2011). The Services segment is comprised of business process outsourcing, information technology outsourcing and document outsourcing. Its Business Process Outsourcing services include human resources services; finance and accounting services; healthcare payers and pharma; customer management solutions; government healthcare provider solutions; technology-based transactional services for retail, travel, and non-healthcare insurance companies; programs for federal, state, county, and town governments; transportation solutions; and government healthcare solutions. The Information Technology Outsourcing specializes in designing, developing and delivering effective IT solutions. Its services include mainframe server outsourcing,

network outsourcing, desktop outsourcing. In addition, it provides remote infrastructure management, help desk/service desk management, managed storage, utility computing, disaster recovery and security services. Document Outsourcing includes the sale and support of a broad range of document systems from entry level to high-end.

The Technology segment is comprised of document technology and related supplies, technical service and equipment financing. Its strategic product groups within this segment include entry, mid-range and high-end products.

The remainder of the sales (7% of 2011 revenues) falls into the Other category which comprises of paper supplies, wide format systems, licensing revenues, GIS network integration solutions and electronic presentation systems and non-allocated corporate items. The company was founded in 1906 and is headquartered in Norwalk, CT. It employs 139,000 globally.

## Investment strategy

We rate shares of Xerox Corp Neutral. We view the shares to be fairly valued with fairly balanced risk/reward profiles. Unfavorable secular trends (mobility and cloud) coupled with weak macro trends are likely to hamper print demand trends in the near to mid term. Offsetting these negatives is the company's emphasis on higher growth Services business and free cash flow generation.

## Valuation

Our target price of \$8 is based on 7x F12 month EPS 12 months from now. During the past five years, Xerox shares have traded in a range of 5-14x F12 non-GAAP EPS with a median of 9x. We are using a target multiple of 7x, toward the lower end of this historical range and in line with the company's current valuation multiple due to the current macro backdrop and the long-term secular headwinds facing the imaging industry resulting in flattish earnings growth, but partially offset by continued positive FCF generation over the next three years.

## Risks

Specific risks that could cause the stock to outperform/underperform our estimates and/or target price include:

- 1) Macro impact on capital spending, pages printed and the transition to color.
- 2) Internet, wireless and cloud computing — While Xerox's focus on high-end, document intensive industries and applications provides near-term protection against substitution by soft copy and on-line content, we believe that enterprise and small business page growth will decline over time as portable devices (laptops, smart-phones, tablets, etc.) proliferate, wireless networks become faster and the cost digital storage declines
- 3) Financing — The Company's funding activity exposes Xerox to potential losses associated with customers' inability to make timely payments under lease agreements.
- 4) Currency — Xerox derives roughly 35% of total revenue from Europe and other international markets. A significant and sustained strengthening in the U.S. dollar could have a significant negative impact on reported revenue growth.

## Lexmark International Inc

### Company description

Lexmark develops, manufactures and supplies printing, imaging, document workflow, and content management solutions for the office. The company operates in the office imaging and enterprise content management and business process management markets. Its products include laser printers, inkjet printers (recently announced plans to exit the inkjet market), multifunction devices, dot matrix printers and associated supplies, and ECM and BPM software solutions and services. The company operates through two segments: Imaging Solutions and Services and Perceptive Software. The Imaging Solutions and Services segment offers a broad portfolio of monochrome and color laser printers, laser multifunction products, inkjet all-in-one devices and accessories, as well as software applications, software solutions and managed print services to help businesses efficiently capture, manage and access information. Perceptive Software segment (2% of 2011 revenues) offers a complete suite of ECM and BPM software products and solutions according to the needs of different users in varying industries such as healthcare, higher education, government and financial services.

Primary competitors are HP, Epson, Samsung & Canon, which account for a majority of worldwide market share. Distinguishing itself, however, Lexmark is one of only two companies worldwide to develop and market its own technology in all three high-volume segments of the printer market (color inkjet, mono, and color laser).

The company was founded in 1991 and is headquartered in Lexington, KY. It employs more than 13,000 globally. Lexmark recently announced restructuring actions associated with exiting the inkjet business and related supplies. Restructuring actions are expected to be completed by 2015.

### Investment strategy

We rate Lexmark shares Sell. We continue to have concerns about the company's ability to grow revenue and operating income over the medium to long term given unfavorable secular demand trends (mobility and cloud) coupled with weak macro trends which are likely to hamper print demand trends. While the company's recent announcement to restructure their businesses by exiting the inkjet business is a positive longer term, we believe near to mid term fundamentals remain challenged and we expect the road to recovery from recent restructuring to be a painful one. We expect estimates to come lower over time as the exit of the inkjet business is factored in.

### Valuation

Our target price of \$18 is based on 5x F12-month EPS. During the past five years Lexmark shares have traded in a range of 5-17x F12 non- GAAP EPS with a median of 8.5x. We are using a target multiple of 5x, toward the lower end of this historical range due to the current macro backdrop, the long-term secular headwinds facing the imaging industry, weak competitive positioning and potential for declining earnings longer term. Our target multiple of 5x is mainly based on our below-consensus EPS estimates (as consensus has not adjusted for the exit of the inkjet business). Our Sell rating compares with consensus ratings distribution of 8% buy, 42% hold, 50% sell.

## Risks

Specific risks that could cause the stock to outperform our estimates and/or target price include:

- 1) Macro impact on capital spending, pages printed and the transition to color.
- 2) Internet, wireless and cloud computing — We believe that enterprise and small business page growth will decline over time as mobility, cloud and shift to managed print services and document outsourcing services which will result in lower demand for printing hardware in the next few years.
- 3) Degree of Competitive Intensity- The company also suffers a significant scale disadvantage versus competitors such as Hewlett-Packard, Canon and Xerox and Samsung in terms of direct procurement, R&D and sales & marketing. While Lexmark has been able to compete with these competitors effectively over time, there have been periods such as 2005-10 where the company has fallen meaningfully behind the competition on product technology or product breadth due to its inability to invest as broadly as competitors.
- 4) While Lexmark enjoys patent protection on portions of inkjet and laser cartridges that prevent third parties from producing new cartridges compatible with the company's printers, a number of companies are marketing remanufactured cartridges that could cause attach rates on new Lexmark supplies to decline within the company's installed base. Given that supplies represents the bulk of Lexmark's total operating income, any significant change in attach rates on Lexmark-branded supplies would have a material affect on the company's business.

If the impact to printing demand from the above factors is less than expected and the operating margin performance in Lexmark's software segment significantly improves, the earnings power of the company could increase materially.

## Electronics for Imaging Inc

### Company description

Electronics for Imaging, Inc. provides digital imaging and print management solutions for commercial and enterprise printing. It manufactures color digital print controllers, format printers and inks. The firm operates through three business segments: Controllers (~45% of sales), Industrial Inkjet (~40% of sales) and Productivity Software (~15% of sales). The company's controllers are sold to OEMs as stand-alone print controllers or as embedded/design licensed solutions. The Inkjet segment consists of VUTEk super-wide format digital inkjet printers and ink used for printing large displays/billboards; Jetrion industrial inkjet digital printing systems, and specialty inks for the packaging, and direct mail industries; and Rastek hybrid and flatbed UV wide format graphics printers for the mid-range printer market. The Productivity Software segment consists of software technology focused on automating print workflow, improving the quality of print output and providing ERP functionality to commercial print shops.

The company was founded in 1988 and is headquartered in the San Francisco Bay Area in CA. It employs approximately 1,500.

## Investment strategy

We rate shares of EFI Neutral at current levels. We view the shares to be fairly valued with fairly balanced risk/reward profiles. Favorable secular trends in industrial/commercial printing coupled with the company's emphasis on shareholder returns are offset by weak macro trends which will hamper overall IT spending and print demand near term and the volatility associated with the product cycle-driven controller business which comprises 45% of non-GAAP gross profit—as well as our assessment that operating margins are likely to expand at a slower rate going forward given that wide-format inkjet will drive a larger percentage of revenue growth.

## Valuation

Our target price of \$18 is based on 13x F12-month EPS 12 months from now. During the past two years EFI shares have traded in a range of 10-18x F12 non-GAAP EPS with a median of 13x. We are using a target multiple of 13x, in line with median multiples due to the current macro backdrop, the long-term secular headwinds facing the imaging industry, and the lower growth rates projected, partially offset by the higher cash generation capability. EFI's shares currently trade at 12.5x F12M EPS estimates and we are not forecasting any material upside to consensus estimates or multiple expansion. Our Neutral stock rating is more conservative than consensus which has 100% buy ratings.

## Risks

Specific risks that could cause the stock to outperform/underperform our estimates and/or target price include:

- 1) Economic Downturns -- EFI faces weak customer demand during economic downturns as their customers struggle with slowing demand for their services, especially from hard hit areas such as auto and retail. Further, much of EFI's business is driven by hardware purchases that are particularly hard for their customers to justify in recessionary environments.
- 2) Customer Concentration--While EFI's customer concentration has declined significantly in recent years, Ricoh and Xerox represented 26% of total revenues in 2011. The risk associated with this customer concentration most recently manifested itself during the most recent economic downturn.
- 3) Controller Competition from OEM Customers--EFI's largest competitors in the Controller market are also its largest OEM customers. EFI's largest competitors in the Controller market both began developing their own controllers in 2000 and took significant share from EFI between 2000 and 2003. While the share shift to OEMs seems to have abated for now, OEM decisions regarding controller pricing and bundling with each new product generation will be a source of quarter-to-quarter volatility in EFI's controller revenue for the foreseeable future. In addition, mix shifts toward lower-end copiers and printers--whether cyclical or secular--place significant pressure on EFI's average selling prices because low-end printers, copiers and MFPs tend to use embedded controllers rather than standalone controllers.
- 4) Inkjet Competition from Much Larger Competitors--Several of EFI's largest competitors in this market, including Hewlett-Packard and Fuji, are significantly larger and more diversified and may therefore be able to allocate significantly greater R&D resources to these efforts. In this market, EFI will therefore be attempting to gain share from a larger, more diversified incumbent.

5) EFI's Financing of their Own Customers--EFI finances some of their customers using their own balance sheet. Financing is not a core business to EFI and could result in them loaning money to customers who would not find financing through other third parties. These customers may pose a higher risk of default and negatively impact EFI's business.

If the impact of any of these risks is greater than we expect, EFI shares could have a difficult time achieving our estimates and could fail to reach our target price.

Meanwhile, if the impact to printing demand from macro and secular drivers is less than expected and the revenue performance in EFI's controller segment significantly improves, the earnings power of the company could increase materially.

## Nokia Oyj

### Company description

Nokia is the second largest global market leader in mobile phones with approximately 20% market share and a ~10% global smart phone market share. The company has experience several competitive challenges from Samsung and Apple in recent years resulting in Nokia losing its position as the world's largest handset company when the company captured nearly 40% of the market in 2008. In 2011 Nokia made a key strategic decision to fully embrace Microsoft Windows phone operating system going ahead versus Nokia's previous Symbian operating system. As a result Nokia is in the midst of a major restructuring in both product and strategy. Nokia employs 130,000 staff globally with headquarters in Espoo, Finland. Nokia operates through the following segments: Devices and Services, Location and Commerce and Nokia Siemens Network. The Device and Services division accounts for ~60% of group revenues and is focused on developing smart phone, mass market phones and related services and applications. The Nokia Siemens Networks segment (~35% of revenues) provides a portfolio of mobile, fixed and converged network technology, as well as professional services including managed services, consultancy and systems integration, and deployment and maintenance services to operators and services providers. The Location & Commerce segment (~5% of revenues) includes the development of location-based products and services for consumers, as well as platform and local commerce services for feature phones and smart phones, device manufacturers, application developers, internet service providers, merchants, and advertisers.

### Investment strategy

We rate Nokia shares Neutral. Nokia continues to face multiple challenges from iPhone and Android invasion and is unlikely to gain any pricing power in a Windows Phone Ecosystem anytime soon. However, with meaningful ecosystem support from carriers globally (and Microsoft), a likely positive Halo effect from Windows 8 (4Q12 launch), the potential disposal of NSN, more aggressive patent monetization, undemanding valuation levels and a 5% dividend yield we see limited downside risk to the current share price.

### Valuation

Our Nokia target price is €2.12. Our target price of Euro 2.12 is based on 1x book value per share 12 months from now. As EPS estimates are meaningfully lower and negative relative to the past two years, we expect investors to look at book value for valuation support. During the past two years during which Nokia has faced severe



share pressures in mobile devices, Nokia shares have traded on an average 1.3x book value per share with a low of 0.5x and a high of 2.3x. Shares are currently trading at 0.9x BV/share and given current macro backdrop, potential for further share losses and potential for further restructuring, we do not expect multiples to revert to mean levels.

## Risks

Given the severe degradation in market share, sales and profitability (negative EPS in the near to mid term) and given the shares are trading below Euro 5, we assign a High Risk Rating to these shares.

We highlight the following risks that could impact the shares: macro demand, adverse FX movements, turnaround strategy based on Window Phone, new product design and market share relative to Apple, Samsung and other Android devices, ability to cater to changing consumer electronic trend to touchscreen devices (e.g. Tablets), data services growth and long-term telco capex. We also highlight litigation risk if mobile technology, either phones or networks, becomes strongly associated with health problems. If the impact on the company from any of these factors proves to be greater or less than we anticipate, the stock will either likely have difficulty achieving our financial and target prices or materially outperform our target.

**Notes**

**Notes**

**Notes**

## Appendix A-1

### Analyst Certification

The research analyst(s) primarily responsible for the preparation and content of this research report are named in bold text in the author block at the front of the product except for those sections where an analyst's name appears in bold alongside content which is attributable to that analyst. Each of these analyst(s) certify, with respect to the section(s) of the report for which they are responsible, that the views expressed therein accurately reflect their personal views about each issuer and security referenced and were prepared in an independent manner, including with respect to Citigroup Global Markets Inc and its affiliates. No part of the research analyst's compensation was, is, or will be, directly or indirectly, related to the specific recommendation(s) or view(s) expressed by that research analyst in this report.

### IMPORTANT DISCLOSURES

#### International Business Machines Corp (IBM)

##### Ratings and Target Price History Fundamental Research



	Date	Rating	Target Price	Closing Price
1	16-Oct-09	1M	*141.00	121.64
2	20-Jan-10	1M	*150.00	129.00
3	19-Oct-10	1M	*160.00	139.07
4	19-Jan-11	1M	*175.00	155.80

\* Indicates change

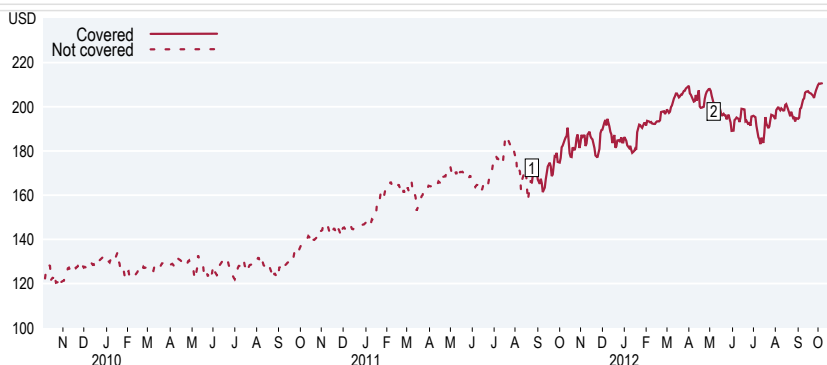
	Date	Rating	Target Price	Closing Price
5	20-Apr-11	1M	*190.00	168.28
6	19-Jul-11	1M	*205.00	183.65
7	8-Oct-11	Stock rating system changed		
8	8-Oct-11	*1	205.00	182.39

	Date	Rating	Target Price	Closing Price
9	18-Apr-12	1	*235.00	199.51
10	7-May-12	Coverage terminated		

Rating/target price changes above reflect Eastern Standard Time

#### International Business Machines Corp (IBM)

##### Ratings and Target Price History Best Ideas Research Relative Call (3 Month)



	Date	Rating	Target Price	Closing Price
1	24-Aug-11	*ADD MP	-	165.58

\* Indicates change

	Date	Rating	Target Price	Closing Price
2	7-May-12	*REM MP	-	201.48

Rating/target price changes above reflect Eastern Standard Time

## Dell Inc (DELL)

### Ratings and Target Price History Fundamental Research



	Date	Rating	Target Price	Closing Price
1	20-Nov-09	1M	*19.00	14.29
2	19-Feb-10	1M	*20.00	13.47
3	21-May-10	1M	*19.00	13.35
4	20-Aug-10	1M	*16.00	12.07

\* Indicates change

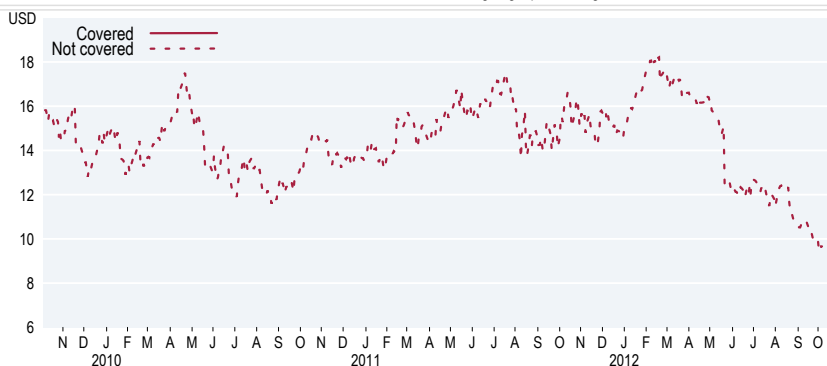
	Date	Rating	Target Price	Closing Price
5	19-Nov-10	1M	*17.00	13.90
6	16-Feb-11	1M	*19.00	15.34
7	18-May-11	1M	*20.00	16.34
8	8-Oct-11	Stock rating system changed		

	Date	Rating	Target Price	Closing Price
9	8-Oct-11	*1	20.00	15.28
10	22-Feb-12	*2	*19.00	17.40
11	7-May-12	Coverage terminated		

Rating/target price changes above reflect Eastern Standard Time

## Dell Inc (DELL)

### Ratings and Target Price History Best Ideas Research Relative Call (3 Month)



\* Indicates change

Rating/target price changes above reflect Eastern Standard Time

## Electronics for Imaging Inc (EFII)

### Ratings and Target Price History Fundamental Research



	Date	Rating	Target Price	Closing Price
1	29-Oct-09	2H	*12.00	11.66
2	24-Jan-10	2H	*13.00	12.57
3	30-Apr-10	2H	*15.00	12.85
4	23-Jul-10	2H	*11.00	11.00

\* Indicates change

	Date	Rating	Target Price	Closing Price
5	21-Oct-10	2H	*14.50	13.99
6	20-Jan-11	2H	*15.00	15.41
7	25-Apr-11	2H	*20.00	17.74
8	28-Sep-11	2H	*15.00	13.98

	Date	Rating	Target Price	Closing Price
9	8-Oct-11	Stock rating system changed		
10	8-Oct-11	*2	-	14.32
11	7-May-12	Coverage terminated		

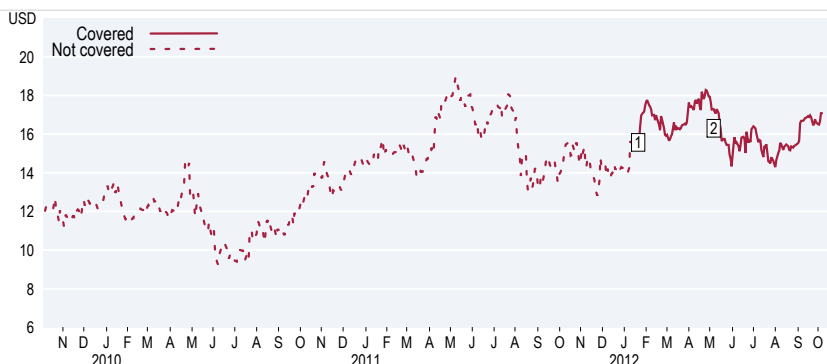
Rating/target price changes above reflect Eastern Standard Time

## Electronics for Imaging Inc (EFII)

### Ratings and Target Price History

#### Best Ideas Research

#### Relative Call (3 Month)



	Date	Rating	Target Price	Closing Price
[1]	20-Jan-12	*ADD LP	-	15.70

\* Indicates change

	Date	Rating	Target Price	Closing Price
[2]	7-May-12	*REM LP	-	17.29

Rating/target price changes above reflect Eastern Standard Time

## EMC Corp (EMC)

### Ratings and Target Price History

#### Fundamental Research



	Date	Rating	Target Price	Closing Price
[1]	22-Oct-09	1M	*20.00	17.49
[2]	27-Jan-10	1M	*21.00	17.04
[3]	21-Apr-10	1M	*24.00	19.84
[4]	21-Jul-10	1M	*25.00	19.87

\* Indicates change

	Date	Rating	Target Price	Closing Price
[5]	25-Jan-11	1M	*28.00	24.73
[6]	20-Apr-11	1M	*32.00	28.45
[7]	8-Oct-11	Stock rating system changed		
[8]	8-Oct-11	*1	32.00	22.39

	Date	Rating	Target Price	Closing Price
[9]	18-Oct-11	1	*28.00	23.72
[10]	25-Jan-12	1	*29.00	25.64
[11]	19-Apr-12	1	*33.00	27.90
[12]	7-May-12	Coverage terminated		

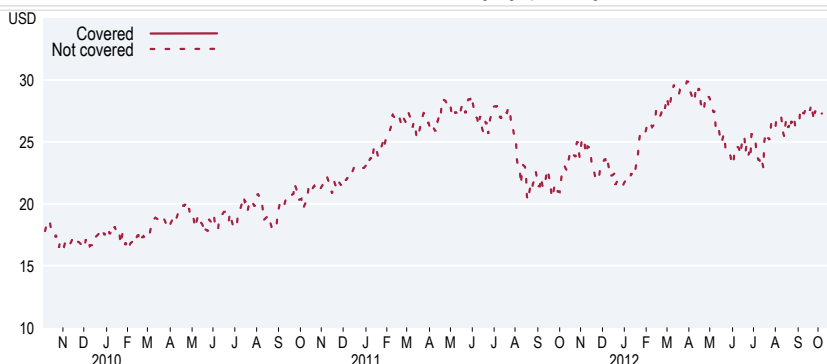
Rating/target price changes above reflect Eastern Standard Time

## EMC Corp (EMC)

### Ratings and Target Price History

#### Best Ideas Research

#### Relative Call (3 Month)



\* Indicates change

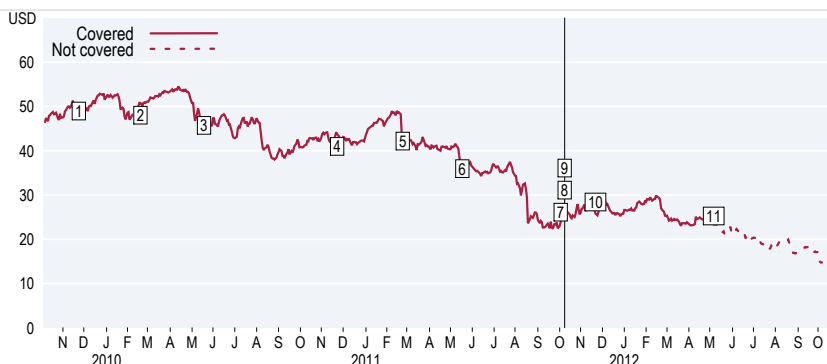
Rating/target price changes above reflect Eastern Standard Time



# **Hewlett-Packard Co (HPQ)**

## **Ratings and Target Price History**

### **Fundamental Research**



	Date	Rating	Target Price	Closing Price
1	24-Nov-09	1M	*60.00	50.05
2	18-Feb-10	1M	*64.00	50.79
3	19-May-10	1M	*65.00	45.95
4	23-Nov-10	1M	*70.00	43.74

\* Indicates change

	Date	Rating	Target Price	Closing Price
5	23-Feb-11	1M	*65.00	42.17
6	18-May-11	1M	*45.00	36.13
7	4-Oct-11	1M	*28.00	23.86
8	8-Oct-11	Stock rating system changed		

	Date	Rating	Target Price	Closing Price
9	8-Oct-11	*1	28.00	24.88
10	22-Nov-11	1	*35.00	25.78
11	7-May-12	Coverage terminated		

Rating/target price changes above reflect Eastern Standard Time

# **Hewlett-Packard Co (HPQ)**

## **Ratings and Target Price History**

### **Best Ideas Research**

### **Relative Call (3 Month)**



	Date	Rating	Target Price	Closing Price
1	20-Jan-11	*ADD MP	-	47.22

\* Indicates change

	Date	Rating	Target Price	Closing Price
2	24-Aug-11	*REM MP	-	25.03

Rating/target price changes above reflect Eastern Standard Time

# **Ingram Micro Inc (IM)**

## **Ratings and Target Price History**

### **Fundamental Research**



	Date	Rating	Target Price	Closing Price
1	30-Oct-09	*1H	*23.00	17.65
2	19-Feb-10	1H	*25.00	18.01
3	30-Apr-10	1H	*26.00	18.16
4	30-Jul-10	1H	*23.00	16.53

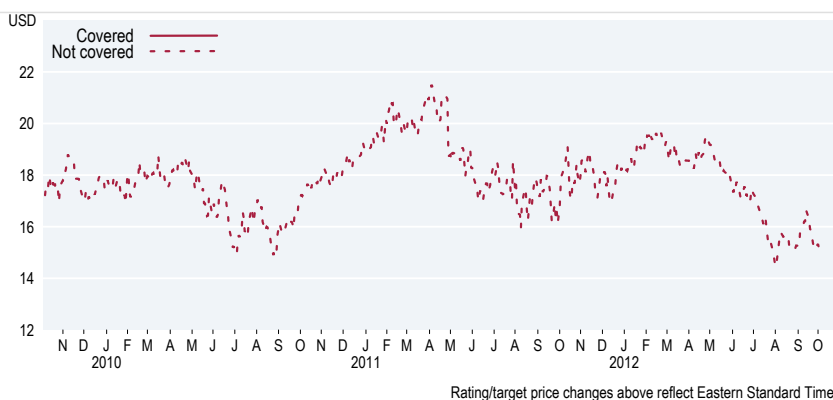
\* Indicates change

	Date	Rating	Target Price	Closing Price
5	31-Oct-10	1H	*25.00	17.66
6	29-Apr-11	1H	*24.00	18.73
7	8-Oct-11	Stock rating system changed		
8	8-Oct-11	*1	24.00	18.09

	Date	Rating	Target Price	Closing Price
9	17-Oct-11	1	*22.00	17.38
10	9-Feb-12	1	*23.00	19.37
11	26-Apr-12	1	*24.00	19.53
12	7-May-12	Coverage terminated		

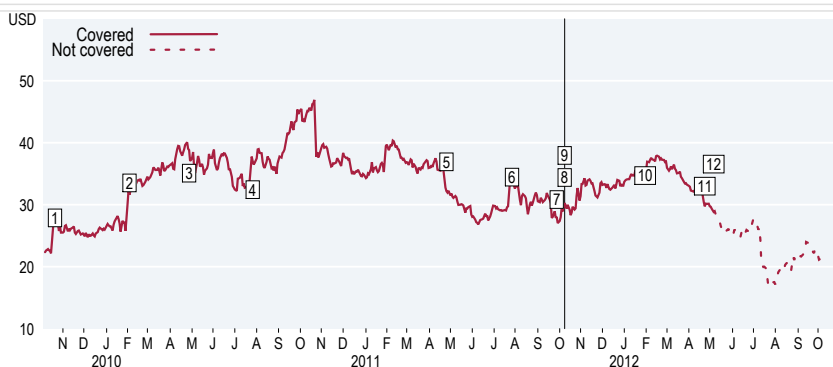
Rating/target price changes above reflect Eastern Standard Time

**Ingram Micro Inc (IM)**  
Ratings and Target Price History  
Best Ideas Research  
Relative Call (3 Month)



\* Indicates change

**Lexmark International Inc (LXK)**  
Ratings and Target Price History  
Fundamental Research



	Date	Rating	Target Price	Closing Price
1	21-Oct-09	1H	*41.00	27.62
2	3-Feb-10	1H	*52.00	31.61
3	28-Apr-10	1H	*56.00	38.80
4	27-Jul-10	1H	*55.00	37.00

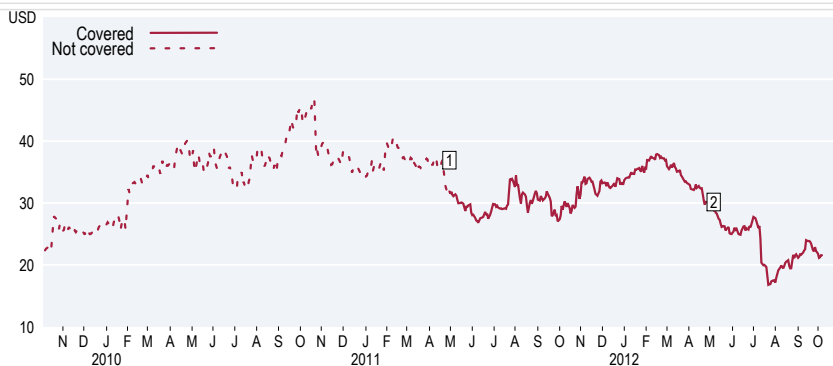
	Date	Rating	Target Price	Closing Price
5	26-Apr-11	*2H	*36.00	32.19
6	27-Jul-11	2H	*38.00	33.90
7	28-Sep-11	2H	*30.00	28.03
8	8-Oct-11	Stock rating system changed		

	Date	Rating	Target Price	Closing Price
9	8-Oct-11	*2	30.00	28.92
10	31-Jan-12	2	*35.00	35.67
11	24-Apr-12	2	*31.00	29.73
12	7-May-12	Coverage terminated		

\* Indicates change

Rating/target price changes above reflect Eastern Standard Time

**Lexmark International Inc (LXK)**  
Ratings and Target Price History  
Best Ideas Research  
Relative Call (3 Month)



	Date	Rating	Target Price	Closing Price
1	29-Apr-11	*ADD LP	-	32.25

	Date	Rating	Target Price	Closing Price
2	7-May-12	*REM LP	-	28.83

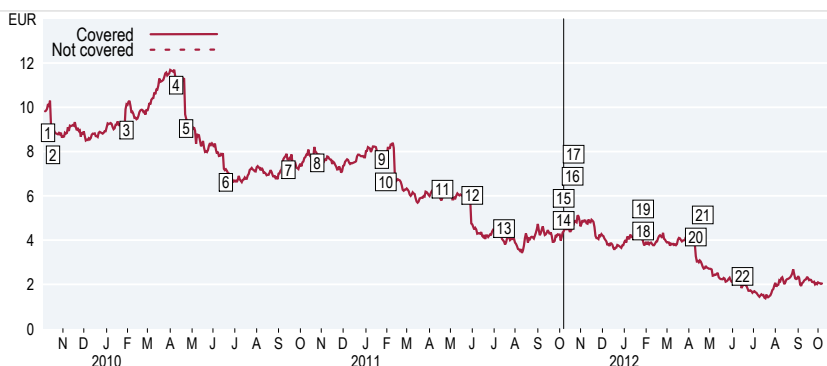
\* Indicates change

Rating/target price changes above reflect Eastern Standard Time

## Nokia Oyj (NOK1V.HE)

### Ratings and Target Price History Fundamental Research

Analyst: Amit B Harchandani  
Covered since September 3 2012



	Date	Rating	Target Price	Closing Price
1	9-Oct-09	1H	*13.00	9.93
2	19-Oct-09	1H	*12.50	9.15
3	29-Jan-10	1H	*13.00	10.14
4	9-Apr-10	1H	*13.50	11.34
5	23-Apr-10	*2H	*10.60	9.49
6	18-Jun-10	2H	*7.10	7.20
7	15-Sep-10	*3H	*6.10	7.64
8	26-Oct-10	3H	*6.30	7.86

\* Indicates change

	Date	Rating	Target Price	Closing Price
9	25-Jan-11	3H	*6.40	7.68
10	31-Jan-11	3H	*6.80	7.82
11	20-Apr-11	3H	*5.60	5.94
12	1-Jun-11	3H	*4.10	4.71
13	15-Jul-11	3H	*3.50	3.93
14	7-Oct-11	Stock rating system changed		
15	7-Oct-11	*3	3.50	4.40
16	20-Oct-11	3	*4.10	4.73

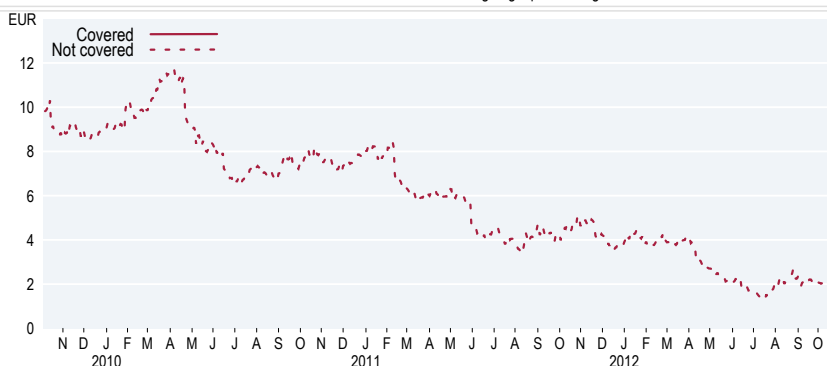
	Date	Rating	Target Price	Closing Price
17	21-Oct-11	3	*4.00	4.71
18	27-Jan-12	3	*3.80	3.92
19	27-Jan-12	3	*3.40	3.92
20	11-Apr-12	3	*2.30	3.27
21	20-Apr-12	3	*2.10	2.79
22	15-Jun-12	*2	*1.80	1.93

Rating/target price changes above reflect Eastern Standard Time

## Nokia Oyj (NOK1V.HE)

### Ratings and Target Price History Best Ideas Research Relative Call (3 Month)

Analyst: Amit B Harchandani  
Covered since September 3 2012

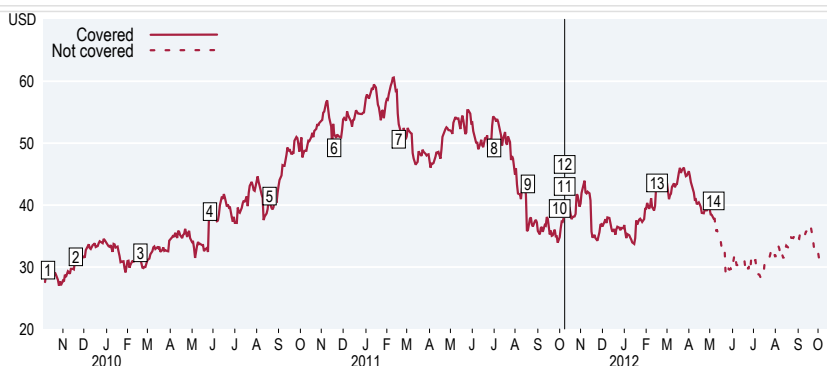


\* Indicates change

Rating/target price changes above reflect Eastern Standard Time

## NetApp Inc (NTAP)

### Ratings and Target Price History Fundamental Research



	Date	Rating	Target Price	Closing Price
1	9-Oct-09	1H	*35.00	28.84
2	19-Nov-09	1H	*37.00	30.44
3	18-Feb-10	1H	*39.00	31.29
4	27-May-10	1H	*46.00	37.68
5	19-Aug-10	1H	*50.00	40.53

\* Indicates change

	Date	Rating	Target Price	Closing Price
6	18-Nov-10	1H	*60.00	51.46
7	17-Feb-11	*2H	60.00	53.05
8	1-Jul-11	2H	*61.00	54.32
9	18-Aug-11	2H	*45.00	35.95
10	3-Oct-11	*1H	45.00	34.83

	Date	Rating	Target Price	Closing Price
11	8-Oct-11	Stock rating system changed		
12	8-Oct-11	*1	45.00	37.29
13	16-Feb-12	1	*50.00	42.20
14	7-May-12	Coverage terminated		

Rating/target price changes above reflect Eastern Standard Time

**NetApp Inc (NTAP)**  
Ratings and Target Price History  
Best Ideas Research  
Relative Call (3 Month)



**Synnex Corp (SNX)**  
Ratings and Target Price History  
Fundamental Research



	Date	Rating	Target Price	Closing Price
1	6-Jan-10	2H	*35.00	30.40
2	25-Jun-10	*1H	35.00	26.58
3	30-Sep-10	1H	*38.00	28.10
4	12-Jan-11	1H	*46.00	34.41

	Date	Rating	Target Price	Closing Price
5	25-Mar-11	1H	*44.00	31.47
6	29-Jun-11	1H	*45.00	31.70
7	28-Sep-11	1H	*36.00	27.74
8	8-Oct-11	Stock rating system changed		

	Date	Rating	Target Price	Closing Price
9	8-Oct-11	*1	36.00	26.92
10	11-Jan-12	1	*39.00	34.99
11	28-Mar-12	*2	*42.00	37.97
12	7-May-12	Coverage terminated		

\* Indicates change

Rating/target price changes above reflect Eastern Standard Time

**Synnex Corp (SNX)**  
Ratings and Target Price History  
Best Ideas Research  
Relative Call (3 Month)



**Tech Data Corp (TECD)**  
**Ratings and Target Price History**  
**Fundamental Research**



	Date	Rating	Target Price	Closing Price
1	23-Nov-09	1H	*\$56.00	43.01
2	23-May-10	1H	*\$54.00	40.20
3	23-Nov-10	1H	*\$60.00	45.92
4	2-Mar-11	1H	*\$63.00	51.28

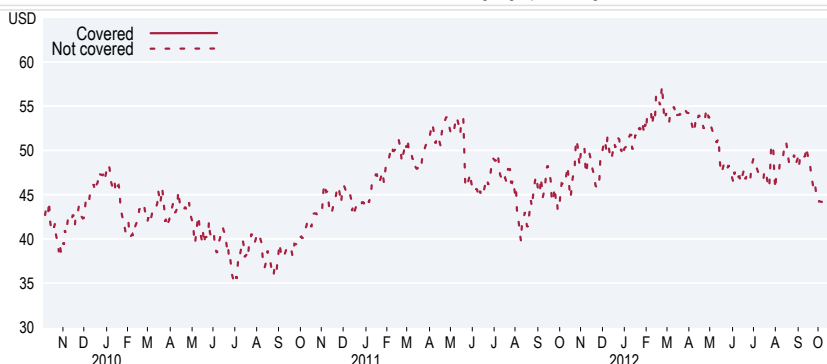
\* Indicates change

	Date	Rating	Target Price	Closing Price
5	19-Aug-11	1H	*\$54.00	41.36
6	8-Oct-11	Stock rating system changed		
7	8-Oct-11	*1	54.00	46.24
8	21-Nov-11	1	*\$55.00	47.08

	Date	Rating	Target Price	Closing Price
9	28-Feb-12	1	*\$63.00	53.48
10	7-May-12	Coverage terminated		

Rating/target price changes above reflect Eastern Standard Time

**Tech Data Corp (TECD)**  
**Ratings and Target Price History**  
**Best Ideas Research**  
**Relative Call (3 Month)**



\* Indicates change

Rating/target price changes above reflect Eastern Standard Time

**Xerox Corp (XRX)**  
**Ratings and Target Price History**  
**Fundamental Research**



	Date	Rating	Target Price	Closing Price
1	10-Feb-10	1H	*\$11.00	8.76
2	26-Apr-10	1H	*\$14.00	10.81
3	25-Apr-11	1H	*\$13.00	10.08

\* Indicates change

	Date	Rating	Target Price	Closing Price
4	8-Oct-11	Stock rating system changed		
5	8-Oct-11	*1	13.00	7.17
6	26-Oct-11	1	*\$12.00	8.57

	Date	Rating	Target Price	Closing Price
7	26-Jan-12	1	*\$10.00	7.88
8	7-May-12	Coverage terminated		

Rating/target price changes above reflect Eastern Standard Time

**Xerox Corp (XRX)**  
**Ratings and Target Price History**  
**Best Ideas Research**  
**Relative Call (3 Month)**



A director of Citi serves on the board of IBM Corporation. Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of International Business Machines Corp

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Accenture PLC

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Automatic Data Processing Inc

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Amphenol Corp

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Arrow Electronics Inc

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Cisco Systems Inc

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of EMC Corp

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Flextronics International Ltd

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Google Inc

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Hewlett-Packard Co

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Intel Corp

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Jabil Circuit Inc

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Microsoft Corp

Citigroup Global Markets Inc. owns a position of 1 million USD or more in the debt securities of Motorola Solutions Inc

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