

Hewlett Packard Enterprise Company

Third Quarter 2019 Earnings Conference Call

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CORPORATE PARTICIPANTS

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Tarek Robbiati – *Chief Financial Officer*

Andrew Simanek – *Head, Investor Relations*

PRESENTATION

Operator

Good morning, good afternoon, good evening and welcome to the Third Quarter 2019 Hewlett Packard Enterprise Earnings Conference Call. My name is Gary and I'll be your conference moderator for today's call. At this time, all participants will be in a listen-only mode. We will be facilitating a question and answer session towards the end of the conference. Should you need assistance during the call, please signal a conference specialist by pressing the "*" key followed by "0." As a reminder, this conference is being recorded for replay purposes.

I would now like to turn the presentation over to your host for today's call, Mr. Andrew Simanek, Head of Investor Relations. Please proceed.

Andrew Simanek

Good afternoon. I am Andy Simanek, Head of Investor Relations for Hewlett Packard Enterprise. I'd like to welcome you to our fiscal 2019 third quarter earnings conference call with Antonio Neri, HPE's President and Chief Executive Officer and Tarek Robbiati, HPE's Executive Vice-President and Chief Financial Officer.

Before handing the call over to Antonio, let me remind you that this call is being webcast. A replay of the webcast will be made shortly available after the call for approximately one year. We posted the press release and the slide presentation accompanying today's earning release on our HPE Investor Relations webpage at investors.hpe.com.

As always, elements of this presentation are forward-looking and are based on our best view of the world and our businesses as we see them today. For more detailed information, please see the disclaimers on the earnings materials relating to forward-looking statements that involve risks, uncertainties and assumptions.

For a discussion of some of these risks, uncertainties and assumptions; please refer to HPE's filings with the SEC including its most recent Form 10-K. HPE assumes no obligation and does not intend to update any such forward-looking statements. We also note that the financial information discussed on this call reflects estimates based on information available at this time and could differ materially from the amounts ultimately reported on HPE's quarterly report on Form 10-Q for the fiscal quarter ended July 31, 2019. Also, for financial information that has been expressed on a non-GAAP basis, we have provided reconciliations to the comparable GAAP information on our website.

Please refer to the tables and slide presentation accompanying today's earnings release on our website for details. Throughout this conference call, all revenue growth rates unless noted otherwise, are presented on a year-over-year basis, and adjusted to exclude the impact of currency. Finally, please note that after Antonio provides his high-level remarks, Tarek will be referencing the slides and our earnings presentation throughout his prepared remarks. As mentioned, the earnings presentation can be found posted to our website and it is also embedded within the webcast player for this earnings call.

With that, let me turn the call over to Antonio.

Antonio Neri

Thanks Andy. Good afternoon, everyone. Thank you for joining us. In Q3, we continued to demonstrate disciplined execution which expand the profitability across the company. In a more

uneven market, we improved both growth and operating margins, delivered strong non-GAAP earnings per share and generated a record level of year-to-date free cash flow. These results reflect our momentum as we take deliberate steps to shift our portfolio to higher value, software-refined offerings delivered as a service.

This quarter, we also advanced our innovation agenda. We made organic investments in new products and announced strategic acquisitions that drive growth by significantly enhancing our ability to help customers with their digital transformations. We delivered revenue of \$7.2 billion in Q3, up 1% sequentially and down 3% year-over-year adjusted for the Tier 1 business.

Our revenue growth was primarily impacted by deliberate actions through HPE Next including portfolio rationalization as well as some macroeconomic factors. Importantly, we continued to deliver growth in key areas of strategic investment including high performance compute, Hyperconverged Infrastructure, hybrid cloud and HPE Point Next services orders of which GreenLake is a key driver of our growth.

Our gross margin of 33.9% is up 170 basis points from last quarter and 340 basis points year-over-year. This was fueled by the mix shift of higher value offerings and commodities pricing tailwinds. Non-GAAP operating profit margin of 9.9% is up 80 basis points year-over-year. And our non-GAAP EPS of \$0.45 is up 7% year-over-year and above the high end of our previous outlook.

Both the quantity and the quality of our free cash flow continues to improve. Year-to-date, our free cash flow is \$860 million which is up \$790 million from the same prior year period. As a result of our ongoing performance, I am very pleased to say that this marks our seventh quarter of raising our non-GAAP EPS outlook for the year.

Before I provide specific highlights of our business performance, I will offer a few perspectives on the macroenvironment. We continue to see uneven demand due in part to ongoing trade tensions which impact market stability and customer confidence. This is showing up in elongated sale cycles particularly larger deals as we noted last quarter and reiterated during our IR Summit at our Discover Conference in June.

However, our customers continued to affirm their need to accelerate their digital transformations to improve business outcomes and customers and employee experiences while reducing costs. The explosion of data will continue to fuel underlying demand for solutions to help protect, store, manage and analyze their data. And this is where we are laser-focused. We have a strong portfolio solutions and services that span the Intelligent Edge and hybrid cloud.

We are uniquely positioned to help our customers with this transition. This is why at our Discover Conference we unveiled new innovations to accelerate customers' enterprises with edge-centric cloud-enabled and laser-driven solutions, and I announced that we will offer our entire HPE portfolio as a service by 2022.

To share pro forma highlights from our business segments, I will start with Intelligent Edge. In Q3, our Intelligent Edge business delivered revenue of \$762 million, up 14% sequentially, which is better than our sequential growth last year, but down 2% year-over-year. As we noted last quarter, we are actively addressing the sales coverage model in the United States. I am pleased with the action taken to-date that have resulted in positive traction with our US product business which was up over 40% sequentially.

We delivered solid growth in EMEA, in APJ and in our Aruba services business. This growth was driven in part by new customer wins. For instance, Vancouver Clinic which provides healthcare services across Southern Washington wanted to deliver modern healthcare and reliable connectivity for staff nurses and doctors to access patient records and utilize medical devices. They chose Aruba's mobile-first network with Aruba OS 8, to deliver secure mobility and allow the clinic to perform live network upgrades without interrupting connectivity. A key factor in their decision was Aruba ClearPass which addressed the security concerns as it allows the IT team to quickly and easily create policies for authenticating and onboarding new devices.

With a population of more than 750,000 residents, the County of San Mateo here in California has standardized on Aruba for their wireless network access control and Edge switching solutions. A key factor in the County's decision to choose Aruba was its need for securing stable access to mission-critical applications in locations such as the County-funded hospital. Customers are recognizing the advantage of Aruba solutions to deliver exceptional customer experiences at Intelligent Edge. This is one reason Aruba emerged as the only vendor in the leader's category in the recent Forrester New Wave Wireless Solutions report, which evaluated eight of the most significant vendors in the wireless space.

We also launched new offerings during the quarter including solutions for fast growing mid and small market customer segments, and extended services to capture additional enterprise customers. We introduced Aruba Instant On, a secure scalable and simple Wi-Fi solution for small businesses allowing the SME market to benefit from a proven enterprise expertise. Now small businesses can deliver a seamless wireless experience with an easy setup that can be managed from any mobile device.

We extended the HPE GreenLake portfolio to the Edge by announcing HPE GreenLake for Aruba which gives organizational flexibility and choice in how they obtain and support their Edge infrastructure. We unveiled exciting enhancement to Aruba Central, our cloud-based network platform that manages more than 20,000 customers' branch networks.

With this next generation customer will benefit from Artificial Intelligence powered network analytics, improve security and user-centric assurance for wired, wireless and edge infrastructures from a single point of control. We believe the Intelligent Edge is the natural next step of the cloud experience. The opportunity of the Edge is all about using technology and data to bridge the digital and physical worlds. Increasingly, business outcomes will depend on the experiences that enterprises can deliver at the Edge. Our strong portfolio enable us to capitalize on this exciting opportunity.

Turning to Hybrid IT, we delivered our highest operating margins since Q1 fiscal year '17. Our operating margin of 12.7% was up 260 basis points year-over-year. Revenue of \$5.5 billion was down 3% year-over-year when adjusted for Tier 1 in China. While we saw some signs of macroeconomic softness and longer sales cycles in certain markets, we realized year-over-year traction in critical areas for customers.

High performance computing realized its 10th consecutive quarter of growth and composable cloud grew 28%. While storage overall experienced a modest revenue decline against the tougher market backdrop in year-over-year compare, we gained momentum in key strategic areas like HP Nimble Storage, which grew 21% and Hyperconverged which grew 4%.

On the innovation front, we announced HPE Primera, a new storage platform for mission critical workloads. HPE Primera offers unprecedented deployment times of 20 minutes, a guarantee of

100% data availability and upgrades with no downtime for a truly differentiated customer experience. HPE Pointnext services orders included Nimble orders grew 2% in constant currency, as we have the highest quarter yet for services intensity. We demonstrated success in attaching a greater level of services and favorable mix shift to infrastructure with higher attach rates.

HPE GreenLake is now one of our fastest growing businesses. This quarter, we continued to see very strong customer momentum with order growth of 10% year-over-year, or 42% excluding one large deal from the prior year. In addition to bringing as a service to the Edge with HPE GreenLake for Aruba this quarter, we also launched new solution to accelerate HPE GreenLake growth in the mid-market. Customers are choosing HPE GreenLake for choice, flexibility and speed to market. For instance, we were selected by the Publicis Groupe for our HPE GreenLake for SAP HANA, a managed private cloud solution to provide speed, scalability and budget predictability.

As part of their move to SAP HANA, Publicis evaluated public cloud alternatives but determined that on-premises model with our pay per use managed solution built on HPE's recognized industry leadership was the right option for them. Additional customer wins during the quarter demonstrate the strength of our portfolio. We won a significant deal with Rolls-Royce Power Systems AG. The company was looking for a cloud like pay-per-use model with an intelligent data platform that could offer high-speed and low latency. And HPE was the only company with a model that could meet both needs through HPE GreenLake and HPE 3PAR.

In addition, Chase Center, the new home of the NBA Golden State Warriors chose HPE SimpliVity for its 18,000 capacity arena, enabling our private cloud to run application at scale. Chase Center will open its store next month ahead of the 2019-2020 NBA Season, and is already working with Aruba to power personalized digital connected experiences for fans and guests.

In Q3, we also expanded our innovation through our important partnerships and strategic acquisitions. We deepened our strategic relationship with Google Cloud to deliver true hybrid cloud for containers with a choice for as a service delivery through HP GreenLake. We first announced the relationship in April with two HPE-validated designs for Google Cloud Anthos. This expansion shows the growing understanding and acceptance of the fact that the world is hybrid.

Just yesterday, we announced the expansion of our partnership with VMware to offer VMware Cloud Foundation as a service. Through the integration of HPE GreenLake and HPE Synergy with VMware Cloud Foundation, our two companies will allow mutual customers to keep all their applications, tools and data in place, while achieving the benefits of cloud and composable infrastructure. On the acquisition front just after our Q3 close, we acquired MapR's business assets. We have been building our HPE AI portfolio over the last few years. With MapR's enterprise grade file system and cloud native storage, we have a complete portfolio of products to drive AI and analytics applications.

The technology is also highly complementary to BlueData's container platform strategy. HPE plans to support existing customer deployments along with ongoing renewals, and we are pleased to welcome MapR customers and partners and the MapR team to the HPE family.

As you would remember, we announced the Cray acquisition early in Q3 and now expect to close the Cray transaction by the end of Q4 fiscal year 2019, earlier than originally planned.

HPC continues to be a strategic focus area for HPE, and we have a clear differentiation that is even further strengthened by Cray. For instance, Cray recently announced its second exascale supercomputer award with Lawrence Livermore National Lab. And last week, HPE joined NASA Ames at the grand opening of its modular supercomputing facility in Mountain View, California. Supporting our purpose to advance the way we live and work, HPE is building a new supercomputer based on the HPE SGI 8600 system as researchers work to land the first woman and the next man on the moon by 2024.

Turning to HPE Financial Services, revenue of \$888 million represented a modest year-over-year decline. However, financing volume was up 5% when adjusted for currency and operating profit increased 90 basis points year-over-year. HPEFS remains a strategic business that continues to help customers manage and monetize their existing assets in new ways, as well as address the entire product lifecycle to reduce the cost and resource demands of IT.

In summary, I am pleased with our disciplined and focused execution which delivered strong operational performance this quarter. We have been able to simultaneously invest in the future growth of our business, while expanding operating margins, delivering non-GAAP EPS above our previous outlook and generating record levels of cash flow. I remain very confident in our strategy and our ability to continue to drive profitable growth as we pursue the exciting plans we unveiled at Discover to offer our entire portfolio as a service by 2022. By doing so, we will be well positioned to deliver long-term recurring revenue growth and profit.

This is an exciting time at HPE. Over the last two years, we have shifted our portfolio and aligned our investments and execution to that shift. The hard work has paved the way for us to innovate and we are well positioned to capitalize on the significant opportunity in front of us and to continue to deliver strong shareholder value. We look forward to providing more details about our long-term plans at our Security Analyst Meeting in New York on October 23rd.

With that, I will turn it over to Tarek.

Tarek Robbiati

Thank you very much, Antonio. Now, let me provide more detail on our financial results for the quarter. As I have done before, I'll be referencing the slides from our earnings presentation to better highlight our performance in the third quarter of our fiscal year.

Starting with slides one and two, I would like to talk about the key highlights from this quarter. The main takeaways are that we have significantly expanded gross margin this quarter, while simultaneously making further investments in the business and delivering non-GAAP EPS above our previous outlook that we will raise for the full year, marking the seventh consecutive quarter of increased non-GAAP EPS guidance. We have also reached record levels of free cash flow compared to the prior year-to-date period, and grew revenue sequentially in an uneven macroenvironment.

While our revenue continues to be in transition due to deliberate actions such as Tier 1 sales, China optimization and A&PS country exits, we're pivoting our portfolio towards with higher margin and more recurring revenues. This has translated into gross margin expanding by 340 basis points year-over-year this quarter, driven by our portfolio mix shift and commodity tailwinds. Our ongoing execution discipline demonstrates that our underlying profitability and quality of earnings continue to improve quarter-after-quarter. I'll talk more about this in the upcoming slides.

On the cash front, we delivered the highest level of free cash flow we have achieved through the third quarter of the fiscal year as Hewlett Packard Enterprise. With respect to GAAP EPS, we finished the quarter with an EPS loss of \$0.02 that included a \$0.42 reserve due to a one-time arbitration award to DXC compared to the previously provided outlook of \$0.29 to \$0.33 per share for the quarter. While we are disappointed with the ruling, it is important to note that at this stage, our fiscal year '19 free cash flow guidance remains unchanged.

Finally, we also announced recent strategic investment in Cray and MapR. We already closed the purchase of MapR's business assets that we acquired for less than one-time annual revenue. We are also making good progress towards closing the Cray transaction, which is now expected to close by the end of quarter four of fiscal year '19, earlier than originally anticipated. We look forward to deriving significant value from both these acquisitions next year.

Moving onto to a macro view of the business on slide three, we continue to see an uneven demand environment, largely caused by trade tensions similar to what we called out at last quarter's earnings and reiterated at our Discover event in June. While elongated sales cycles persist and remain more pronounced for larger enterprise deals, they are not materially worse than in June. HPE's broad portfolio and global footprint makes us well diversified to handle choppy markets. We have also been able to successfully navigate all of the recent tariff increases on China exports that have been factored into our outlook.

We will now move to slide four that shows our performance in the quarter by segment. I won't take you through every number, but let me hit a few key points. In the Intelligent Edge, we began to make progress improving our go-to-market execution in the United States where our product revenue grew over 40% sequentially. We have also introduced several new offerings for the mid-market and SMB market that are gaining traction. Aruba services growth continues to be solid across all geographies.

In hybrid IT, we continued to grow our higher margin offerings with composable cloud growing at 28% and high performance compute at 2%. Within storage, we again saw notable strength in Nimble Storage, which grew 21% and Hyperconverged Infrastructure, which grew 4%.

In our services business, Pointnext operational services orders and nimble services orders together were up 3% in constant currency, driven by GreenLake orders, which grew 10 % year-over-year. Pointnext advisory and professional services orders also grew in constant currency. And within HPE Financial Services, financing volume was up 5% year-over-year in constant currency and return on equity remains strong, exceeding 15% again this quarter.

Now we will turn to slide five that demonstrates the many contributions we derived from our unique partnership with H3C. As you know, H3C is a major player in the fast-growing China market with number one market share in campus switching and wireless LAN.

As noted on the slide, profit contribution from H3C occurs in three areas; HPE's sales of products to H3C for resale in China market; HPE's resale of H3C's products in the rest of the world outside China; and HPE's share of H3C's profits based upon HPE's 49% stake in H3C. We greatly value our unique partnership with H3C, which helps us capitalize on the incredible growth opportunity in the world's second largest IT market. In addition, HPE's 49% equity stake in H3C has been increasing in value through the put option and publicly traded market value of units.

Slide six shows are EPS performance to-date. Non-GAAP diluted net earnings per share of \$0.45 in Q3 is well above our previously provided outlook of \$0.40 to \$0.44 due to operational outperformance. This marks the ninth quarter in a row that we have exceeded the high end of our non-GAAP quarterly outlook. On a year-to-date basis, non-GAAP diluted net earnings per share has grown 21%.

As a reminder, we ended fiscal year '17 with a non-GAAP EPS from continuing operations of \$0.94. Based on our updated fiscal year '19 non-GAAP EPS outlook of \$1.74 at the midpoint, we have demonstrated tremendous progress in non-GAAP EPS, which has grown by over 85% in the last two years. We have been able to achieve this through significant expansion of our gross and operating margins, which I will talk about next.

Turning to gross margins on slide seven. We continued to deliver significant gross margin expansion as we focus on profitable growth in hybrid IT, shifting our portfolio towards higher value, higher gross margin offerings and commodity tailwinds. Gross margins of 33.9% was up 340 basis points year-over-year and up 170 basis points quarter-over-quarter, the sixth quarter of sequential expansion.

Since Q1 fiscal year 2018, we have expanded gross margin by 560 basis points through a combination of portfolio mix shift, HPE Next initiative and commodity tailwinds. Expanding gross margins is very important as it demonstrates that we have a broad portfolio of software defined, IP rich offerings of significant value to our customers. Similar to the last quarter, let me show you on slide eight how the mix shift in our portfolio is improving our underlying profitability and quality of earnings. Year-to-date, we have expanded gross margins by 270 basis points, driven by portfolio mix shift combined with supply chain efficiencies and lower commodities cost.

Now let me put in perspective the key metrics to measure our mix shift as we pivot our portfolio. The left hand side of the chart shows how the various businesses within hybrid IT contributed to HPE's overall revenue growth in the first 3 quarters of this fiscal year along with a spectrum of gross margins.

First, currency has been a headwind this year of about 130 basis points year-to-date. Second, we continue to wind down the low margin areas of our Tier 1 business that was roughly 5% of our total revenue last year versus only about 2% this year, but at much better gross margins. In compute, the volume compute business declined slightly diluting growth by 70 basis points. But more importantly, our higher-margin value compute business grew 4% year-to-date and contributed 90 basis points to overall growth at a much higher margin.

Storage contributed another 20 basis points to overall growth year-to-date, driven by 49% growth in Nimble. In services, we grew operational services orders, including nimble services at 2% year to date, driven by GreenLake subscription services, which was up 24%. These are both important lead indicators to overall future Pointnext revenue growth. The key takeaway is that our portfolio mix shift is working and our underlying profitability and overall quality of earnings is materially improving.

Now moving to slide nine, we have been able to make significant investments in R&D and sales to support future revenue growth, while driving significant non-GAAP operating margin expansion. HPE Next has enabled us to redirect investments back into the business, including a double digit increase year-to-date in R&D to drive organic innovation in our higher margin, faster growth areas of the portfolio and additional investments in go-to-market to improve sales effectiveness. We expect to drive revenue productivity and growth in the upcoming quarters

from these strategic investments. Meanwhile, non-GAAP operating margin has climbed back up to nearly 10%, up over 250 basis points versus six quarters ago.

Turning to cash flow on slide 10. Free cash flow was seasonally very strong at \$648 million in Q3. On a year-to-date basis, we have delivered a record level of \$860 million in free cash flow that is up \$790 million versus the prior year, driven primarily by higher profitability and lower one-time payments. Underpinning our year-to-date free cash flow performance is an over \$900 million improvement in our cash flow from operations relative to last year. Consequently, at this stage, we believe that we can absorb the unexpected DXC award payment of \$666 million to be made in Q4 within our existing full-year outlook of \$1.4 [billion] to \$1.6 billion of free cash flow.

Slide 11 shows our capital returns to-date. As part of our continued \$7 billion capital return plans through fiscal year '19, we returned \$727 million to shareholders during the quarter. We paid \$150 million in dividends and repurchased \$577 million worth of shares in the quarter. On a year-to-date basis, we have returned approximately \$2.4 billion to shareholders with \$500 million in dividend and \$1.9 billion in share repurchases.

Now turning to our outlook on slide 12. As a reminder, at SAM, we originally guided our fiscal year '19 non-GAAP EPS outlook to be \$1.51 to \$1.61. Due to our strong non-GAAP EPS performance, we raised our full year EPS guidance by \$0.05 in Q1, and other \$0.06 in Q2 to \$1.62 to \$1.72. With continued operational outperformance in Q3, we are again raising our EPS guidance for the full year. We now expect to finish fiscal year '19 with non-GAAP diluted net earnings per share of a \$1.72 to a \$1.76, and we expect our fiscal year '19 GAAP diluted net earnings per share to be \$0.65 to \$0.69. This is now the seventh consecutive quarter that we are raising our non-GAAP EPS outlook.

So overall, I'm pleased with the progress we continue to make on our revenue and margin transition. We will continue to execute against our strategy of shifting our portfolio towards profitable growth that will drive our free cash flow and ultimately shareholder returns.

And as Antonio mentioned, we look forward to having you join us at our Securities Analyst Meeting on October 23rd in New York where we will provide an update on our strategy and financial outlook.

Now with that, let's open it up for questions.

QUESTION AND ANSWER

Operator

We will now begin the question and answer session. To ask a question you may press "*" then "1" on your touchtone phone. If you are using a speakerphone, please pick up your handset before pressing the keys, to withdraw your question please press "*" then "2." We also request that you only ask one question and one follow-up question.

The first question comes from Katy Huberty with Morgan Stanley. Please go ahead.

Katy Huberty

Yes, thank you, good afternoon. We've heard from some of your peers over the last couple of weeks that lower commodity costs are starting to be passed through to customers in the form of lower ASPs. Can you just talk through how that will influence margins over the next couple of

quarters, can you hold on to the margin benefit from commodity prices or will some of that come out of the model? And then I have a follow-up.

Antonio Neri

Yes, thanks, Katy for the question. Definitely, the commodity prices has started to come down, but I think we have executed with discipline on pricing and costs, and therefore we're able to hold a lot of that. And in the short term we believe that will be the case, think about one to two quarters. But at the same time, let's remind ourselves that the content, since you asked the question about ASPs, the content that gets attached to each of the solutions continue to grow. So, whether it is memory, sizing or storage sizing continues to grow, while the cost per bit may be coming down, the reality more our overall content gets attached and therefore less impact on AUPs. But I think we have done an excellent job in retaining the cost decline through more content attach and better pricing discipline.

Katy Huberty

And then on...

Antonio Neri

Tarek has a comment on that.

Katy Huberty

Okay

Tarek Robbiati

Yes. Hi, I just want to add to what Antonio said. There are two effects at play as you point out; one is a tailwind from commodities that Antonio commented on and there is also the revenue mix shift, the revenue mix shift is really critical to us sustaining the gross margins moving forward. And we're confident that by continuing to grow the areas, the revenue streams of higher gross margin, we can maintain the level of gross margins we have overall.

Katy Huberty

Thank you. And then, just as a follow-up on cash flow, you are holding the full year guidance despite the over \$600 million payment. Can you just talk about what the offsetting positives are to help you hold free cash flow guidance?

Tarek Robbiati

Yes, I am glad you asked the question. Last time you and I have spoken you asked us why we didn't raise the free cash flow guidance, you may remember that.

Katy Huberty

Yes.

Tarek Robbiati

My answer to your prior question was we had a pretty wide range of \$1.4 billion to \$1.6 billion. So we stopped to that guidance back then. And now specifically with DXC award from the arbitration, we feel that there are essentially three factors that give us confidence to be able to still deliver the guidance at \$1.4 [billion] to \$1.6 billion.

Number one, you know that our Q4 quarter is the strongest one from a free cash flow generation. We continue to believe this will be the case in this quarter.

Number two, if you really look at the free cash flow guidance of \$1.4 [billion] to \$1.6 billion and the out performance on non-GAAP EPS that out performance is about \$250 million in underlying cash flow earnings.

And number three, we also said at the beginning of the fiscal year that our working capital will be this year contributor to free cash flow as opposed to a use of cash flow resources. So the combination of these three factors makes us believe that at this time, we can withstand the payment of \$666 million to DXC. I will not hide from you that this won't be easy. But at this stage, we feel comfortable we can do that.

Katy Huberty

Okay. That's great. Thank you.

Andrew Simanek

Perfect. Thank you, Katy. Can we go to the next question, please?

Operator

Next question comes from Shannon Cross with Cross Research. Please go ahead.

Shannon Cross

Thank you very much for taking my question. I wanted to dig a bit more into gross margin; I understand NIC [ph] is a big part and obviously components. But, I think Tarek you said it would be sustainable at these levels. I'm curious as to how far you think you can take some of the improvements that you're doing right now and you know, how much further there is to go with gross margin? And then I have a follow-up. Thank you.

Tarek Robbiati

Okay. So as Antonio said, we feel that the commodity tailwinds will continue for a little bit, couple of quarters as we mentioned in the prior question. Over and above that the revenue mix shift plays a very important role in driving higher gross margins. The revenue streams that we have highlighted on our presentation on slide seven...if my numbering is correct...slide eight, excuse me. If you really stack up these revenue streams, they all come up with improved gross margins individually due to the commodities, but also as the more value revenue streams from value, compute, and storage kick-in, you could see that the revenue mix will move into favorable gross margin territory.

And third, I think we are also, as a management team, looking always at ways under HPE Next and otherwise through our global operations team finding efficiencies in the way we purchase commodities to build our products that we manufacture. So on the whole we feel that we have sufficient levers between commodity tailwinds, supply chain efficiencies and revenue mix to sustain the gross margin.

Antonio Neri

And I will add Shannon, which Tarek provided a better comprehensive answer is the fact there is always opportunity to improve our cost structure. HPE Next was the framework to go about it, and we made huge progress. But since then we have cover all the areas which we are executing and that's normal course of business management.

Shannon Cross

Okay. Thank you. And then, I understand net of Tier 1, you were down about 3% in revenue and there is puts and takes throughout the model. How do you think about revenue as revenue

growth versus profitability? I don't know, Antonio, if you want to just balance them off, because clearly at some point we would help you shift back more into your revenue growth situation? So that will take acquisition and continue mix shift. So I'm just curious how you think about that versus cash flow and margin? Thank you.

Antonio Neri

Well, sure, I mean listen I think finding the right balance between growth and profit is always what we are after to, I think as Tarek said, the portfolio mix shift is something that we are completely committed to do and is paying off which has allowed us to make investments in the business in the areas we see the growth is going to happen going forward. And in that investment is both organic and inorganic, so we made a commitment to particular segments of the market on Intelligent Edge which I believe is the next frontier through connectivity, security and the cloud consumption model. I think the multiple use cases we see expanding in that space are sources of growth and we feel pretty good about with the latest innovation we brought into the market.

As I think about the core business, the workload optimize cloud enabled and consumption driven model are areas of growth. And in that, when you think about type of workloads will drive growth, we talk about HPC, high-performance compute, the ability to provide hybrid solutions with software defined experiences is where we're making investments.

And so for us, finding that balance is key, but also getting the portfolio in the right place is what we are really after. And obviously, we believe we are in the right place and the services piece of this is obviously very critical. And that's why I'm so excited about the GreenLake offering, because it is a point of differentiation for us in the marketplace that customers are paying attention and even our competitors for that matter. But getting growth also on the underlying businesses like we did with Nimble is foundational. I don't know Tarek if you want to add anything.

Tarek Robbiati

Yes, I just would like to put a little bit more context on what Antonio has said and put some perspective on our fiscal year '19. Fiscal year '19 was not a year where we wanted to dial up the growth. Fiscal year '19 is a year where we had to deliver on EPS commitment, drive free cash flow; these are the two most important metrics, prepare ourselves to dial-up the growth in the subsequent quarters. And we feel that we've done a fair bit of progress here, there is of course more to be done, but you can see on slide nine that we've made significant investments in FSC dollars and R&D dollars to dial-up the growth in the upcoming quarters.

In addition to Antonio's point, the inorganic investments that we have made will bear fruit. Effectively today, we secured the approval for the completion of the Cray acquisition. This has become official just a few minutes before our call. So we will close the Cray acquisition in Q4 fiscal year '19 and start to consolidate immediately upon the close which is late in the quarter of fiscal year '19. More of that growth will be felt in fiscal year '20 as a result of the consolidation but notwithstanding the consolidation of Cray, we will grow our business overall.

Shannon Cross

Thank you.

Andrew Simanek

Alright. Thank you, Shannon. Let's go to the next question, please.

Operator

And the next question comes from Toni Sacconaghi with Bernstein. Please go ahead.

Toni Sacconaghi

Yes. Thank you. Sorry, I'd just like to revisit the gross margin topic one more time. Maybe you can help provide what estimate you think was...what percentage of the gross margin improvement year-over-year and sequentially was driven by commodities and whether you can confirm there were no one-time factors in Q3? I was just struck by how much gross margins went-up sequentially when revenues were essentially flat, Tier 1 was essentially flat and there didn't seem to be really radical mixes in your business on a sequential basis yet margins went up 170 basis points. So maybe you can help clarify how much was attributable to commodities year-over-year and sequentially that there were no other one-time factors and how we should think about sequential dynamics?

Tarek Robbiati

Okay. So there are no one-time factors that affect the gross margin. That's the first things you can take that off the table.

The second thing, Toni that affects the gross margins is the mix shifts versus the commodities. I'd say to put some metrics around this roughly 50% was mix shift and 50% was commodities. As part of that, you also have to...the mix shift pertaining to Pointnext. The Pointnext OS costs of services is effectively affecting our gross margin. We're injecting more and more automation in Pointnext OS to reduce the actual cost of labor that affects the gross margin component. So all of the levers that are available to us and last but not least, the supply chain as we spoke a moment ago are contributing to augmenting the gross margins. We have a new team in global operations, we are starting to feel the weight of that they carry and the traction they're gaining. We want to see further savings from supply chain moving forward. And so, on the whole because we know this is the most important metric that govern the tax base, we will drive the gross margins to higher level or how high is up, it's for us to see and for you to determine over time as we execute, but we are very pleased with the progress so far, Toni.

Antonio Neri

And Toni, I will add one thing, obviously, we talk about unevenness and what's going on the market, but I think this team has executed with discipline, discipline to participate in the market we want to compete to extract value from that market and that's what resulted in expanded profitability.

Toni Sacconaghi

Okay, thank you for that. If I could just follow up, you talked about unevenness in macro, The question is, how do you know that what you are seeing or the revenue softness that you are experiencing is not due to a more structural shift to the cloud or some of these customers that are passing are not thinking about tighter partnerships with cloud vendors and what makes you confident that the revenue weakness that you've seen, I think relative to expectations, because I think at the beginning you are optimistic that growth would accelerate through the year. So relative to those initial expectations, what makes you confident that this is not something structural rather than what appears to be cyclical demand factors that you're citing?

Antonio Neri

Yes, Toni, let me start by stating that the world is hybrid, and I quoted some of the deals that we won this quarter where you see the value of placing data and workloads both on-prem and off-prem and that's the new reality. And more and more of those workloads and data will be

processed at the Edge and that's the big opportunity...that's why I have a lot of confidence...a confidence in the fact that the data around us will continue to explode, fueled by the digital transformation we all experience in every industry that data has tremendous value. We are only utilizing 6% of that data today and that's why we see an acceleration of new techniques like AI machine learning, Big Data analytics and that's why we're making quite a big significant of investments first to make our infrastructure more intelligent so that the customers don't need to spend money running that infrastructure. Second, to give a simple experience like you would think about the public cloud, in many ways, but with the same economics because we have talked to, I spend 50% of my time with customers and they are telling me at their scale, our production workloads, it is cheaper for them to run it on-prem than off-prem, that said they will put workloads in both places.

And last but not least is the fact that they want to consume more and more as a service and that's the new reality. And so, that's why when I bring it together, the world is hybrid, the Edge is becoming more and more intelligent. The data has value because that's where outcomes are been derived. And I think our portfolio is uniquely positioned to address these new realities and how we connect this world is the opportunity going forward. We have been trimming down, pruning down all the areas we don't want to participate and unfortunately that has taken time whereas the Tier 1 business or some of the advisory and professional services in countries where we believe we couldn't get scale, repay with the resources and funding in the areas we want to go forward and then augment that investment with targeted very disciplined acquisition return on invested capital that will drive growth. And that's why I'm confident, Toni, obviously, we need the right innovation and the right talent. But I will say, this team is...this is really executing with remarkable discipline and you can see the expanded profitability and I think that will continue.

Toni Sacconaghi

Thank you.

Andrew Simanek

Great. Thank you, Toni. Can we go to the next question, please?

Operator

The next question comes from Paul Coster with JP Morgan. Please go ahead.

Paul Coster

Yes, thank you for taking my question. Just drilling into the uneven demand comment, I wonder if you've noticed though any difference in the behavior of enterprise customers versus SMBs or whether there is any verticals which are standing up quite well under this onslaught news, and if there are any verticals which on the other hand are looking particularly uncertain about their IT spending.

Antonio Neri

Sure. So I will say, the SMB mid market continues to be strong, and this is where we are putting a lot of emphasis on what we call the no touch/low touch model for the transaction of high velocity business. We also introduced a new offerings targeted for that segment of the market, an example is Aruba Instant On, where now you can, if you're a small business from a single couple of clicks like two-three clicks on a mobile app, you can actually deploy entire Wi-Fi infrastructure for less than \$200, and so that...

Operator

Pardon me. This is the conference operator. It appears, we have had a disconnection from the speaker's location. Please standby as we try to reconnect them. Pardon me. This is the conference operator, I have rejoined the speaker location to the call. Again, if you have a question, please press "*" then "1." I would like to turn the call back over to the speaker location.

Andrew Simanek

Yes, this is Andy. Sorry everyone for the technical difficulties we were having there. So we'll jump back in with I believe, Paul Coster had asked a question about the macro environment, and any particular verticals that we are seeing and change. So, Antonio...

Antonio Neri

Yes, sorry. But I'm not sure what happened. We will check into after this, but you asked the question about the unevenness of the market and most importantly, which segment of the market. I will start to answer the question that we see good momentum in SMB, and mid-market, particularly on the transactional business and that's why, we have a lot of focus both on the product portfolio and the go to market. We will make some announcement with Aruba on Instant On and the low touch/no touch particularly on the e-commerce side with our channel partners.

And then on Enterprise, we see strong demand in healthcare, I spend a lot of time with them [indiscernible] because of the digitization of their experiences with the mobile first cloud...first approach, at the same time in the industrial space with manufacturing, they need to bridge the analog world with the digital world, oil and gas obviously continue to be a little bit of hit and miss there because of the situation with oil. But overall, when it comes down to larger deals. That's where we see the elongated sale cycles. Sorry about the disruption.

Andrew Simanek

Sorry, Paul, thank you for the question.

Paul Coster

Thank you so much.

Antonio Neri

Alright, thanks, Paul.

Andrew Simanek

Thanks, Paul. Can we go to the next question, please?

Paul Coster

That was good enough. Thank you.

Operator

And the next question is from Simon Leopold with Raymond James. Please go ahead.

Simon Leopold

Great, thank you very much. I first wanted hopefully ask a simple maybe clarification. I appreciate you're reiterating the fiscal '19 free cash flow target. In June, you had also reiterated the fiscal '20 target for roughly \$2 billion of free cash flow. Just wanted to make sure that nothing has changed in your view on that fiscal '20 target?

Tarek Robbiati

Yes, thank you for asking the question. I should have mentioned this. Nothing has changed for our 2020, \$1.9 [billion] to \$2.1 billion of free cash flow guidance.

Simon Leopold

Great, thank you very much for that. And then I wanted to get back to the trending. One of the things we've heard about, and I think, you've even addressed is declining ASPs, and clearly your costs have come down faster and you've benefited from mix. Is there some element that you could help us quantify the dynamic of what degree, you're reducing price since that will factor into maybe our revenue estimates? Thank you.

Tarek Robbiati

Okay. So we are starting to see AUP come down which were up at very low single-digits, and these were reflecting lower DRAM costs that are starting to be pass-through, but we are now almost at a full Gen10 mix. So we are getting less uplifts from the new generation. Having said that, we continue to see more and more option attach and richer configurations, as Antonio mentioned, that will continue to be a trend due to the ever increasing amount of data that has been generated and consumed. So consequently, we should see AUPs tick back up overtime as DRAM costs start to level off or even potentially rebound in the future.

Antonio Neri

And I want to add to that, that since I run the compute business for several years. And I have to tell you, the tick-tock of the technologies and the amount of memory and storage you can attach continue to increase. As we go to the next generation or Gen11 and just take a look at just the latest announce where we made with the AMD, the amount of memory channels you can attach more options to it continues to grow.

And so, now on the same form factor, you have way more memory and way more storage capacity. And like I said before, as the cost per bit may be going down the number of bits continue to grow. And therefore, what we said before is two-third of that AUP is structural and that will continue because now we have new solutions like non-volatile memory and so forth. And so, those are technologies that will find its way through the portfolio that we already provide in the next generations.

Tarek Robbiati

Thank you for that.

Andrew Simanek

Thanks Simon. Can we have the next question, please?

Operator

And the next question comes from Aaron Rakers with Wells Fargo. Please go ahead.

Aaron Rakers

Yes, thanks for taking the question and congrats on the execution on the mix of the business driving forward. On the mix discussion, I'm curious it looks like now your Tier 1 customers for this given quarter has fallen below kind of 1% of total revenue. So it looks like that's kind of that mix shift has finalized itself. But, I'm curious in terms of the overall mix of compute between value versus the volume, where does that mix stand today? And how do you think about that mix, or what it could look like over the next year or two years? And I have a follow-up.

Tarek Robbiati

Yes, look you're right in your assertion around Tier 1. Right now, Tier 1 as we said is 2.2% of HPE's revenue year-to-date. So in the last quarter, it was roughly the amount as you've indicated. But, it is coming at a much higher gross margin and we're happy with that level of gross margin. Revenue with no gross margin makes no sense to us.

With respect to the rest, 50:50 is roughly the answer between volume compute and value compute. But, within that you also have more and more software defined solution which will lift the gross margin up of each of those two categories. And so, that is important to note. We're making those investments in R&D to drive differentiation, that differentiation comes in the form of software defined infrastructure, in both volume and value compute and of course, needless to say, storage and all the other offerings that we have in Hybrid IT.

Aaron Rakers

Okay. And then as a follow-up going back to GreenLake, I think the last quarter or last couple of quarters, you have given some metrics, I know that orders look like they were up about 10%. But, I'm curious any update on how many customers have adopted versus 600 that was quoted last quarter? And where do we stand as far as the contract value of GreenLake at this point? Thank you.

Tarek Robbiati

So we have north of 600 customers right now. Our total contract value is in excess of \$2.5 billion from GreenLake.

Aaron Rakers

Thank you.

Antonio Neri

And as we go along, we're going to share more about this. But the bottom line there is with new logos and expansion of current contracts, so that's the reality. And one of the things that we saw with GreenLake which is very pleasing is the ability to continue to grow once you are in the contract. And the renewal rates which are 99% and the NPS score is 91 which is remarkable for a business like that.

And one comment, I want to add on the volume versus value, we categorize that based on the type of server we talked before on the compute side, but more of the volume will become value as we add to Tarek point, more software and more of the IP we acquire, particularly in areas like flexi in a composable rack. And you can think about it of a server that has a volume aspect but a ton of value added on top therefore becomes, in a packaged solution, becomes a value overtime.

Aaron Rakers

Okay. Thank you.

Andrew Simanek

Thanks Aaron. So we're already running over time. But, I wanted to make sure we gave a little extra since we went dark for a second. So let's go ahead and take one last question, please.

Operator

And that question will come from Rod Hall with Goldman Sachs. Please go ahead.

Rod Hall

Yes, hi guys. Thanks for fitting me in. I wanted to ask about the Pointnext trends and op services within that. So Pointnext still deteriorating by 4%, but op service is up 3%. I just wonder if you guys can help us understand when you would expect that overall line maybe to stabilize. And we'd love it if you'd give you of course the proportionate split between the two things? And then, I have a follow-up.

Tarek Robbiati

So remember, in Pointnext overall you have two revenue streams that have very different economics. One is Pointnext OS and the other one is the A&PS business. Overall, we feel good about the long term opportunity in Pointnext and particularly following Antonio's announcement at Discover to offer our entire portfolio as a service by 2022, and this is where GreenLake plays a crucial role. In Q3, the services orders for Pointnext OS and Nimble grew 3% in constant currency, and our book to bill ratio was similar to last quarter about 1.12. It is important to understand that the mix shift that we're driving across the portfolio of compute to more sophisticated software defined offerings is increasing our attach rates and service intensity to levels that we haven't witnessed in the past. The service intensity in Q3 was the highest quarter ever.

GreenLake, as we mentioned, is also a key driver of Pointnext orders, and is one of our fastest growing businesses with strong customer momentum and GreenLake grew 42%. So that gives you good color around Pointnext OS.

And with respect to A&PS, it's a much smaller portion of the total Pointnext revenue stream. And we are optimizing that business for growth and profitability with the country exits that Antonio referred to at the beginning of this conversation.

Rod Hall

Okay, thank you Tarek. And then just a quick follow-up, since we're over time, could you just clarify, I heard your comments on AUP starting to decline a little bit in core compute ex-Tier 1. Could you just clarify what is happening there with unit volume trends?

Tarek Robbiati

So units were still declining at the low single-digit rate. This hasn't changed but it doesn't truly bothers me again, it's just...what we're trying to do is to shift towards those units that drive higher services attached, number one. There is also an important point to note is that when you look at units on a sequential basis, they were up. So what matters is that we look at the momentum of the business overall and what drives the attach rates which is service intensity in the right type of units we feel reasonably good about the performance on this quarter on that front.

Rod Hall

Great. Okay, thank

Antonio Neri

But, I think this is something very important, our units were up sequentially, and after that the major takeaway. And second is that, our ability to attach to the right units has improved dramatically and that's why we draw the best services intensity yet. And so, for us that's what our strategy is and more software content we add, obviously we attach all the type of services, particularly in the software license associated with those units, not just associated Proactive Care or break-fix type of support.

Again apologies, I don't know what happened to the web service here, but we'll look to it. But, I just want to wrap up by reiterating that we are pleased with our progress in what we call an uneven market. We executed with strong discipline which obviously you can see the results and expanded profitability on record levels of cash flow that give us the confidence to raise our outlook and reaffirm both the 2019 and 2020 free cash flow. And at the same time, we continue to invest in the business, both organic and inorganically, so we can continue to focus on that growth that Shannon asked the question with the right level of profit.

So with that, we're looking forward to see you on October 23rd, at the Security Analyst meeting. Thank you.

CONCLUSION

Operator

Ladies and gentlemen, this concludes our call for today. Thank you.