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PRESENTATION

Amitabh Passi - *UBS - Analyst*

Thank you, everyone. Welcome. My name is Amitabh Passi. I'm the networking and supply chain analyst, and hopefully I won't lose my voice.

It's my pleasure to welcome Juniper. And I think I'm going to hand it off to Kathleen Nemeth first, VP of IR. And then, she'll pass it on to Rami, who will be presenting a few slides. And then, we'll go to Q&A.

Kathleen Nemeth - *Juniper Networks, Inc. - VP, IR*

Thank you, Amitabh. Good afternoon, everyone. We look forward to our discussion with you today. To the extent that we make any forward-looking statements either during Rami's presentation or during our chat with Amitabh, I do want to point out that there are risks associated with that. For a full discussion on those risks, please see our most recent 10-Q filed with the SEC.

With that, I'll turn it over to Rami.

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Thank you, Kathleen. And welcome, everybody. It's a pleasure to be here with you today.

I wanted just to spend a few minutes talking a little bit about Juniper's strategic focus, and then I'll certainly have some time for questions and answers afterwards.

As a quick reminder of Juniper's strategic focus, we're a company that focuses on two primary market segments -- service provider and enterprise. We actually increasingly see a lot of synergies between these two market segments, where we see some of the requirements especially in the high end of the enterprise going in a way that's very similar to the requirements of those service providers.

We address three business lines -- routing, switching, and security. And as a reminder, I'm responsible at Juniper for the platform systems division and specifically the routing and the switching businesses. Increasingly what we like to do at Juniper is we pull technology elements and products from each of these segments -- routing, switching, and security -- into solutions to address specific domains.

So recently, the last couple of weeks, we have announced our next generation data center architecture. We call it MetaFabric, and MetaFabric draws from routing, switching, and security in developing compelling architectures to solve the data center domain problem. And of course, data center is just one of seven domains that Juniper addresses. There's core, edge, access and aggregation, WAN, campus and branch, and consumer and business devices.

I often get asked the question on how do we differentiate and where does our value come from at Juniper. Is it in software? Is it in systems? Is it in silicon? It's really all of the above. And I thought I'd just spend a few minutes talking about how that plays out in terms of our strategy at Juniper.

All advancements in information technology really come from advancements in three fundamental building blocks -- compute, storage, and networking. You really need to push the envelope in each and every one of these building blocks in order to move IT innovation forward. When one of these technology elements falls behind the other, I think it drags them down. A lot of the focus today on networking, in particular about virtualization, has to do with the fact that networking has, quite frankly, lagged behind virtualization of compute and storage.

If you double-click on networking, we firmly believe that innovation in networking depends very much on innovation in three sub-elements, of silicon, systems, and software. If the requirement is agility, certainly software is a very important ingredient of providing that agility. But if the requirement is performance and scalability, then you also need to invest in silicon and systems to complement the investments in software.

So fundamentally, we believe that a balanced approach of investments in all three, of silicon, systems, and software, is required today to satisfy the most difficult, the most compelling networking problems.

And of course, if you double-click on software, there's a lot of discussion today around this concept of software-defined networking. It's true, as with any new innovation or new technology, there's a bit of a [high] cycle you need to get through, but we firmly believe that the promise of SDN is absolutely real.

And we're investing in SDN in order to really provide value for our customers in terms of driving tremendous agility in the network, facilitating the operations of network management, and providing much more intelligence in the network by breaking down the barriers between networking infrastructure and higher layer software. And I'll address that a little bit later in my presentation.

A little bit of a financial recap for PSD in particular for Q3, it was a record revenue quarter for us. Product revenue was $742 million, which was a 17% year-over-year growth. Most of that growth came from our routing business -- 22% year over year at $594 million. Switching revenue was essentially flat year over year, and I'll touch on that in just a second. And we had another great MX revenue quarter. In fact, it was a record MX revenue quarter. MX is our universal edge platform that addresses our service provider customers in addition to some of our enterprises.

Routing, we saw good momentum sequentially in both core and edge. Now, most of the performance that we've seen in service providers has come from the edge, and I think some of you know that already. But we have said for quite some time now, for a few quarters now, that core networks are running hotter and as a result of that, there will need to be a core investment cycle.

At least the last couple of quarters has shown us that sequentially there has been that uptick that supports this thesis. Still early to say, but I think that we've seen an initial data point that's somewhat encouraging.

We released a new Junos software release that provides a lot more functionality for our customers in terms of automation and SDN capabilities and how we tie the underlying infrastructure up into our controller layer.

On the switching side, although revenue was more or less flat year over year, our bookings were strong, and we built healthy backlog going into Q4. We also announced and shipped a couple of new fixed form-factor EX switches primarily for the campus. We view the campus as an important part of an on-ramp to the data center network. And 100-gig line cards for our EX9200 modular switch.

Last but not least, on the SDN front, we announced and shipped the availability of both a commercial and an open source version of our controller that we call Contrail. We firmly believe that there is some real differentiating elements of that solution for our customers.

But we also announced stronger partnership and solutions that we're developing with VMware, in particular their NSX controller and how it operates with our own underlying networking infrastructure.

I thought for the rest of the presentation, I'll just spend a few minutes on the data center, because we've been actually very busy over the last few weeks talking to our customers, analysts, and partners around our data center architecture, our data center solution.

A bit of a historical perspective, we've now been in this market for roughly five years. We introduced our first set of switches in 2008, which complemented our existing routing and security portfolio. A year after that, we introduced our common management layer to provide functionality to manage our end-to-end assets in the data center. We came out with a really compelling data center architecture, a one-tier data center architecture we called QFabric, a few years ago. Complemented that with ecosystem partners. And then, finally, our controller assets we call Contrail, that I just spoke of.

And we've made some real progress. We have well over $2 billion in switching revenue over that time and 20,000 switching customers, in addition to some significant traction on the enterprise routing side. And our success has been across a variety of different market segments -- Fortune 10 customers, telcos, cloud, banking, and so forth. So, we're proud of the results that we've been able to achieve.

Now, a year ago, what we did at Juniper is we actually consolidated multiple, different product business units, if you will. So, we had two different switching business units, which we collapsed into a single business unit. They were focused on QFabric and EX series separately. We got to a point where we felt like the leverage we could get by putting these business units together would be beneficial.

And the result of that organizational change and the investments we've done as a result of that are now started coming to fruition. And a couple of weeks ago, we really announced our next generation data center architecture that we call the MetaFabric. If you think about the data center today, I believe that the data center is plagued with inefficiency and barriers -- barriers that separate the physical world and the virtual world; barriers that separate data centers from other data centers; barriers that separate the infrastructure from the software layers above it.

And MetaFabric architecture essentially takes these barriers and destroys them. It provides a single, common, simple, open, smart network that not only solves the data center problem itself, but the data center problem across sites and across data centers holistically.

So, we're very, very proud of the products and the technology and the solutions that we've put together to solve this problem that we believe is in a very unique and compelling way.

Paramount to this architecture is the openness of the interfaces that we have chosen everywhere. We fundamentally believe in the value of security, switching, and routing to solving the problem, but we also believe very firmly in the need for open interfaces to connect all of these different elements together. And that is a story and a message that's very much resonating with our customers.

As a function of our MetaFabric architecture, we've announced some new and compelling products. First, we announced a new line of switches, our top-of-rack switches. We call these the QFX5100. The QFX5100, one of the unique value propositions of this product is the flexibility. So now, we have a common building block that supports any fabric architecture, whether it be QFabric, or Virtual Chassis, or a Layer 3 approach, or even a new architecture that we've now called Virtual Chassis Fabric. It supports all of these architectural approaches.

I get asked the question, is MetaFabric a replacement to QFabric? Is MetaFabric the Virtual Chassis or QFabric or something different? It's actually about choices between all of the above, with one common building block. That's what you essentially get with this product.

We added some great functionality to the MX to enable the stitching together of virtual and physical worlds and the stitching together of data centers in an open, standards-based approach.

We added functionality to Network Director. This is our network management software that provides a single pane of glass to the management of wired and wireless, data center and campus.

We also introduced ESXi -- this is the most popular hypervisor in the industry today -- to Contrail. So, we've essentially listened to our customers and supported that hypervisor in our Contrail solution.

And last but not least, in order to make the MetaFabric architecture something that is a reality for our customers to facilitate the process of deployment, we've wrapped it with pre-baked, pretested solutions and professional services to help in the deployment of an end-to-end MetaFabric architecture, including security, switching, and routing.

So, with that said, I will take questions.

QUESTIONS AND ANSWERS

Amitabh Passi - *UBS - Analyst*

Thank you, Rami. I was going to get to this later, but I think I'll start here. You talked a lot about data center. You talked a lot about SDN. On the data center side, I think there still is some confusion in terms of positioning QFabric versus MetaFabric versus some of the new switching platforms you introduced, the EX9200. How do we think about your strategy holistically? And maybe you can just elaborate where you're positioning MetaFabric vis-a-vis QFabric?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

OK. Sure. I mentioned earlier that one of the things that we did at Juniper is we actually consolidated business lines that were focusing on different architectural options for the data center. We did this for our own sake in order to drive much more efficiency in engineering and also leveraging and differentiation. But we also did it for our customers. Essentially, we wanted to simplify the product offering and not build one-trick ponies with respect to the switches that we're developing.

And we did this exactly with the QFX5100. No longer does a customer need to make a hard, upfront architectural decision when they invest in this common building block, because now they can buy a QFX5100 and use it as a QFabric element or as a Virtual Chassis element or as a Layer 3 spine leaf architectural element. It does not matter the architectural approach and, in fact, the customer has the ability to evolve their architectural approach over time with nothing more than a software upgrade.

That's a very compelling value proposition for our customers.

QFabric is just one architectural approach for the data center problem. MetaFabric actually pools resources of compute, storage, and networking within a data center and across many data center sites. So, this is the -- meta -- in MetaFabric. It really actually works not just within the data center. It pools assets across many data centers.

Amitabh Passi - *UBS - Analyst*

I think your MetaFabric announcement also came out around the same time as Cisco's unveiling of Insieme. Again, maybe you can help just flesh this out a bit -- architectural differences, what's your unique differentiation? I think in the case of Insieme, we heard a lot about APIC, their controller. So, maybe you can just help put MetaFabric in context with what your competitor is doing?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Sure. Well, certainly, the controller component of the data center is an increasingly important component. This is in many ways one of the strategic layers of any SDN deployment.

We have a controller now that is differentiated in terms of its scale, its resiliency, its ability to peer with other controller in other SDN islands. It's shipping. It's not just a Power Point. It's shipping. And we have now an open source version of that controller that will really appeal to the open stack, cloud stack community that's out there, which is a growing community. So, that is the controller element.

As I step back and think about how Juniper fits in the data center and our opportunity, I think about it this way. You have players in the data center that are focusing on just specific elements. Let's say just switching, or just security.

On the other hand, you have the much larger competitors that are looking at a broader set of functionality, an end-to-end architectural and portfolio play of switching, routing, and security. But they're quite frankly doing it in a much more of a closed interfaces approach. And I don't think that's what customers want. I think, when I talk to my customers, they're looking for far more of a flexible approach that doesn't lock them into a particular architecture or vendor.

Our opportunity at Juniper is to come in with really compelling technology in each and every layer that matters -- in the controller, in the switching, in the routing, and in security -- but to do it in such a way as to alleviate any concern of vendor lock-in by focusing on open interfaces everywhere. That is our opportunity. That is what MetaFabric is all about. And that is the story that's resonating with many of our customers today.

Amitabh Passi - *UBS - Analyst*

Rami, just maybe on that point, your switching business seems to have been relatively inconsistent. We see good quarters, lackluster quarters. Do you feel like you have all the pieces in place? And then, related to that, as I look at your data center strategy, do you feel like you have all the pieces in place to be more relevant in the data center versus still more to go?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

On the lumpiness of the switching business, your observation is correct, and it has to do with the fact that a good part of our switching business is not just enterprise. It's also on the service provider side, and those opportunities and those POs, if you will, come -- they're lumpy. And it results lumpiness in the overall business itself.

So, take for example Q3, while revenue was essentially flat, we saw good bookings growth, and that's again primarily a function of the lumpiness of the service provider component of that business.

As far as the data center and the elements that we have, we've got a really differentiating security component right now, with our intrusion deception technology. We have an increasingly competitive switching story with the QFX5100, the flexibility that it offers. And then, we have again an increasingly differentiating routing component with the MX that acts as essentially what we call an SDN universal gateway, that has the ability to connect SDN islands, to connect data centers together.

So, yes, I am actually quite [confident] with what we have today, and of course we're not sitting back. We're continuing the innovation engine, and the story will only get better in time.

Amitabh Passi - *UBS - Analyst*

Excellent. I'm sure you and I could talk SDN for days, but maybe just a couple of minutes on it. As I have conversations with investors, I think there is this notion of hardware irrelevance in an increasingly software-defined world. There's this increasing notion that software overlays make the physical underlay irrelevant. So, curious what your perspective is in SDN? And you've also announced partnerships or working engagements with VMware. How does it all come together within the context of SDN? So maybe, (a) what is your vision of SDN, what pain points are customers are trying to resolve; and then, (b) some of these perceptions that exist out there?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Sure. So, I view SDN as an opportunity for us, as simple as that.

As far as the pain points that we want to address, today networks are too complicated to manage. So, SDN will vastly simplify the operations of networks.

Today, there is not enough agility in the way that services are delivered to end-users by network operators. It's true on the enterprise side and the service provider side. And SDN will solve that problem by extracting services out of the tight interlock that they currently have with the network.

And finally, SDN will unlock information and value that's trapped in the network layer, by unleashing it and providing communications up into the user and the application space.

I think those three key areas are the areas that we view as an opportunity for us to solve with SDN technology for our customers.

There is a second dimension of your question which is around, well, does the hardware still matter in that world? I will go back to the statement that I made about the fact that it's about silicon, systems, and software. If we as an industry start to believe that you can solve every problem, every networking problem, with software alone, we are missing the boat.

Software has absolutely a huge component and an increasingly important component in solving networking problems. But as long as performance and scale is important -- and the last time I checked, network traffic is going up and to the right -- then you will need to invest in silicon and in software.

Now, one might say you can invest in silicon and software or you can buy it off the shelf. The answer to that question is, yes. In certain applications, we will develop our own silicons, because we believe that we can have significant differentiation by doing so. In some applications, like for example in certain parts of switching, we will use merchant silicon and add the value through the software layer.

So, it's really a -- it's very much market segment dependent and in some cases even within a market segment, specific layers of network dependent on how we assemble the value with our own software, our own silicon, or merchant silicon approaches.

Amitabh Passi - *UBS - Analyst*

And anything specific you would want to highlight in terms of your partnership with VMware?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Absolutely. Extremely important partnership. We're very closely aligned with VMware at the executive level.

The fact of the matter is VMware has significant market share in the server virtualization market. And for many customers, the quickest path or the easiest path for them to get to network virtualization is through the VMware suite of software.

So, the best thing that we can do for our customers is to facilitate that path to network virtualization by making our systems, our software work seamlessly with VMware's orchestration software and their NSX controller. And that's exactly what we're doing right now.

Amitabh Passi - *UBS - Analyst*

Why don't I pause and see if there's any questions?

While we wait for a mic, maybe a quick one. I'm sure you've been getting this question today, and I'm sure there's only so much you can say. But I was curious. You just appointed a new CEO. A pretty big announcement for Juniper. Just at a high level, I think Shaygan probably a relatively less familiar person in the valley. So, maybe if you just shed some light in terms of what was so attractive about the CEO appointment, his candidacy, and why he makes for the perfect CEO?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Well, before I answer that question, I want to just make sure that everybody understands that Shaygan, yes, we announced his CEO appointment, but he doesn't actually start until January. So, it's still very, very early.

But that said, I've certainly talked to him, and I'm very excited about working with him. I think he brings a number of different skills and experiences to the Company that can be very valuable to Juniper. Certainly, he has the experience of the pain points directly from a customer's perspective, both on the service provider and the enterprise side. He's got a lot of respect and connections in the industry, and I think a lot of great ideas that are going to benefit us as a Company.

Unidentified Audience Member

Cisco's comments about their dire forecast about next quarter, about next year on demands on networking. Do you see that?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

I'm just going to refer back to the outlook that we provided in the last earnings call. I think we're going to -- I'm comfortable with that. And I will just point out that when it comes specifically to emerging markets, our approach to emerging markets is just different than our larger competitor. It's much more surgical. It's really focused on investing in key areas of the market where we feel that we have true technology differentiation. And it's one that leverages our partner approach. So, we have strong partners in the region that will take us to market in the emerging markets.

Unidentified Audience Member

This is probably a question that could go on for half an hour, or the answer rather, not the question. Just wondered on what the differences are between yourselves and Nuage Networks on the SDN side on Contrail? They talk a lot about openness just like you have.

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Between ourselves and who?

Unidentified Audience Member

Nuage. Alcatel-Lucent, let's call it what it is. And I just wondered, other than I guess the support for open flow, what the major differences are between your two platforms today and going forwards? Thank you.

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Again, with --.

Unidentified Audience Member

Well, I guess putting the support open flow aside, what the major differences are, because I guess both of you talk about openness of (multiple speakers)? Yes, the [control points].

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

(multiple speakers) Well, there are a number of different things. First of all, I would say that if you look at the architectural approach that Alcatel-Lucent takes with their controller, it's actually somewhat similar to Juniper's. So, it really comes down to the details of the differentiation in the controller itself and then the underlying platforms that work with that controller.

All I will say now is that I think that the team that we have assembled for development of Contrail, this is a team that combines the networking skill set with true experience in developing scaled out software architectures along the lines of what the massively scalable web 2.0 companies do out there. And that is a very powerful combination.

And it results in differentiation in terms of things like the resiliency. So, there is no single point of failure to the controller that we're providing. Peering -- the ability to have peering of different data centers, which is so important to so many of our customers as they get into hybrid cloud architectures. And just scale, sheer scale. The fact of the matter is you want a controller that will grow with the number of assets that you're managing underneath it and again, there, I think you'll find that that's a very true differentiator.

You asked about open flow and I don't think I caught the entire question, but I will say that open flow is a protocol, and it is a protocol that is supported by many of our platforms, our switching and our routing platforms. We don't believe that that is going to be the predominant protocol that will be used in SDN architectures. It is a protocol, and I think there are other approaches depending on the specific application that you're trying to solve that might be even better than open flow.

Amitabh Passi - *UBS - Analyst*

Rami, just on your routing business, you've had several quarters of strength in edge. Core, I think the last quarter was the first time. I hate to use this phrase, but I will. Where are we in the cycle? How do we think in terms of how much more momentum there is on the edge side? And how do you think about the core, since it seems like we're just starting?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

It's true that the last few quarters have been characterized with strong year-over-year performance in the edge. The edge just sees more drivers for growth. It's not just capacity. It's capacity. It's connectivity. It's services. And for that reason, if one of these drivers starts to lag, there can be another driver that picks up where it left off.

The core, it's all about one thing, which is capacity. And for that reason, you're waiting for when networks get hot enough the operators start to see a compelling need to invest in them. We saw over the last couple of quarters, in fact, sequential growth in the core. So, that gives us some confidence. But it's still too early to call a trend.

These cycles vary in length, but I'd say they're typically multi-quarter. And I'm not going to try to call the start and the end to either the edge or the core. The thing that we can control the most, the most important thing that I'm focused on is to make sure that we're ready with the best, most compelling solutions for any layer -- core, edge, access aggregation -- irrespective of when that cycle starts for each of those layers.

Unidentified Audience Member

About six months ago if you spoke to some of your customers, they would probably have, when evaluating you and some of the other large players, gone with some of the other large players. Something seems to have changed in the last six months. Is it because you're providing them with a better product roadmap going forward? Or, is that just our perception? I'm just trying to understand what's changed.

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

I guess just reading between the lines, it seems like that change is a positive change.

Unidentified Audience Member

Yes. Correct.

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

It's hard to say. I think that we have --. At any point in time at Juniper we are innovating. We are developing really compelling technology, in my mind. I've been at the Company now for close to 17 years, 9 to 10 of those years were in developing products. We're always working on the latest generation of silicon, the next generation of systems and software. It just might be a function of the timing of that development cycle with our communication of that roadmap to our customers.

So, it could be that now as we, for example, have come out with our next generation data center architecture, the MetaFabric, and the set of switches and MX functionality associated with it, that more and more customers are seeing it and reacting positively to it, which could explain what you're seeing.

Unidentified Audience Member

And if I can ask a follow-up, SDN, I'm sure everyone can talk about it for a long time, but actually when do we start to see customers trying to trial it within the actual --?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

That's a good question. As we were going through the beta and trial period of Contrail, the interest level was very large. In fact, we had tens of customers going through trials of that product line. So, there's no shortage of interest in reaping the benefits of an SDN architecture in providing that simplicity and the agility that I think our customers want.

But that said, I will say that we're early stages, and this will play out over multiple quarters, because it is a very different way in architecting and developing a network and it's going to require a bit of muscle, if you will, a new muscle to be built on the part of network operators, data center operators, service providers in adopting that technology.

The most important thing for us to do right now as a Company is to leverage our technology, but to work very closely with some strategic customers to get to deployment and proof points of the value that this architecture can bring to their network. That's what we're maniacally focused on right now. We will start small, focused on a few customers, and then expand from there.

Amitabh Passi - *UBS - Analyst*

Rami, how will we track your momentum with Contrail? Is that something you plan to give us some visibility in terms of customer count? And is that the right metric? Or, is there some other better metric that gives us some sense of the adoption curve?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Quite frankly, have not really considered that, but it's something we can absolutely consider, to give you the visibility into true customer adoption of SDN type architectures.

Amitabh Passi - *UBS - Analyst*

Maybe a couple on the routing side. Competition, there's this perpetual fear of you potentially losing share to Alcatel-Lucent, Huawei at the edge. I would love to get your thoughts on that.

And then, just PTX, we haven't really heard much more in terms of key reference customers beyond the first major one. Just how should we be thinking about the trajectory for PTX?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

So, let me start with the second question first. PTX, if you look at the growth of that platform since birth, it's actually tracking very nicely relative to the plans that we had set out for it. And you have to understand that PTX is not the traditional approach to solving a core routing problem. It's essentially a new architectural approach to solving the transport problem with a packet-based architecture.

And considering the differences in architecture, considering the fact that last year was in fact a down year in core routing, I'm pleased with the performance of the PTX, not just domestically in the US but internationally.

On the broader question of competition, this has always been a competitive market space. When Juniper was born as a company, it was an extremely competitive market space, and I think that that has not changed over the years. The most important thing that we must do is to ensure that we have differentiating technology, and I believe that we have that at the edge and in the core.

At the edge, nobody has the same value proposition as the MX universal edge platform and its diverse ability to solve any number of edge services for our customers. In the core, we've got this three-pronged strategy. If you want to upgrade an existing core network, nothing easier than to do it with a T Series upgrade. It's in-service, no network disruption.

With the PTX, you now have the most efficient transport solution to a problem in a network.

And then, finally, we have the MX2020. The MX2020, we can leverage the tremendous momentum and deployed base that we have with the MX at the edge and use that architectural approach to now expand into the core.

I don't think anybody has the breadth of those options and really going after the core opportunity.

The last component of the competitive situation in routing, I would say, is in access and aggregation, especially as it pertains to 4G, LTE-type deployment. It's still very early for us, but we now have a very compelling solution for LTE build-outs with our ACX Plus, MX Plus network management solution for that market segment.

Amitabh Passi - *UBS - Analyst*

I'll do a quick poll, if there's any questions out there?

Very quiet.

Just maybe going back to SDN quickly, where do you think the strategic control point is in the architecture? Is it the controller?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

I think the controller is an important element, but I think that if we believe that the controller alone is the only strategic element, then we're probably off the mark, because the controller by itself can't solve all networking problems either within the data center or in the service provider environment.

If you look at where we are investing in as a Company, we're investing in the controller itself, and we want to make sure that's differentiating. We're investing in the underlying systems that provide the hooks up into the controller, the visibility in terms of analytics up to the controller. We're also investing in the services, in particular the security services, that will round out our solutions.

I think you really need to have that package but again, very importantly, with open interfaces between each and every element.

Amitabh Passi - *UBS - Analyst*

Any other questions?

Unidentified Audience Member

[Some of the consensus with regards to] open stack are that it puts a lot of pressure back to the customer in terms of building it out. So, it makes it more resource-heavy for them. So, what's your response with regards to that, given that that's where MetaFabric is more targeted towards?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

That relates back to your prior question around how long is this SDN adoption curve going to play out for. The way that we view it, the momentum behind open stack, cloud stack is increasing significantly. And that's one of the drivers for why we actually open source Contrail, because we believe that the community of people that like that architectural approach would be very interested in having an open source version of the controller.

With that said, I think the approach there is to rely on our own professional services organization and to work closely with systems integrators that specialize in these types of architectural build-outs, if you will, with an open stack solution, our Contrail asset, our switching assets to solve data center or service provider edge type architectures.

Amitabh Passi - *UBS - Analyst*

Rami, as you look at your portfolio, would you say you have most of the critical pieces in place? Are there one or two areas that you think you could further bolster?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Well, we're always in a mode where we feel like there's more to do. This is a company of engineers and innovators, and we've always got grand ideas, if you will.

But that said, I think one of the things that we've done that's very helpful is when we look at our market segments and our opportunity in the data center and the service provider, we micro-segment and we look at where it is that we have the tools to be most effective, and that's where we focus. We focus our go-to-market there. We focus our R&D there. And we make sure that we win in a particular market segment before we go and start to address other micro segments, if you will.

That's a discipline that we've introduced over the last year that I think is very much paying off for us. And it helps us not end up in a situation where we have not enough solution to go after any one opportunity. We really focus on a particular opportunity, build out the solution for that before you move on to the next one.

Amitabh Passi - *UBS - Analyst*

I'll ask you one more. I don't know if you can answer this, but I will ask. One of the frustrations I hear from investors is around OpEx and OpEx management. I think you have one of the highest percentages, in terms of sales, of R&D spend. We've seen other companies in this sector that have throttled back on OpEx, returning cash in an aggressive way, and they're being rewarded for that. So, just any thoughts you may have around OpEx, OpEx optimization, and maybe [use of cash]?

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

It's a balanced approach at the end of the day. We recognize that, and in fact we've provided long-term guidance on what our OpEx will be as a function of our revenue. We've made progress toward that. And we have to balance that out with the innovation and the investment that we need to make in our technology to maintain our competitive differentiation.

So, that's the balance that we play out at Juniper, and I think we've made good progress.

Amitabh Passi - *UBS - Analyst*

All right. I think we're almost out of time. If there's any last-minute questions?

OK. Thank you.

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Thank you very much for your time.

Amitabh Passi - *UBS - Analyst*

Thanks so much for your time.

Rami Rahim - *Juniper Networks, Inc. - EVP, Platform Systems Division*

Thank you.
