



BlackBerry Limited

Fiscal Year 2020 Second Quarter Results

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C O R P O R A T E P A R T I C I P A N T S

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Daniel Chan, *TD Securities*

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P R E S E N T A T I O N

Operator:

Good morning, and welcome to the BlackBerry Fiscal Year 2020 Second Quarter Results Conference Call. My name is Lisa and I'll be your conference moderator for today's call. During the presentation, all participants will be in a listen-only mode. We will be facilitating a brief question and answer session towards the end of the conference. Should you need assistance during the call, please signal a conference specialist by pressing star, zero. As a reminder, this conference is being recorded for replay purposes.

I would now like to turn the presentation over to our host for today's call, Christopher Lee, Vice President of Finance. Please go ahead.

Christopher Lee:

Thank you, Lisa. Welcome to the BlackBerry Fiscal Year 2020 Second Quarter Results Conference Call. With me on the call today are Executive Chairman and Chief Executive Officer, John Chen, and Chief Financial Officer, Steve Capelli. After I read our cautionary note regarding forward-looking statements,

John will provide a business update and Steve will then review the financial results. We will then open the call for a brief Q&A session.

This call is available to the general public via call-in numbers and via webcast in the Investor Information section at BlackBerry.com. A replay will also be available on the BlackBerry.com website.

Some of the statements we'll be making today constitute forward-looking statements and are made pursuant to the Safe Harbor provisions of applicable U.S. and Canadian securities laws. We'll indicate forward-looking statements by using words such as "expect," "will," "should," "model," "intend," "believe," and similar expressions. Forward-looking statements are based on estimates and assumptions made by the Company in light of its experience and its perception of historical trends, current conditions and expected future developments, as well as other factors that the Company believes are relevant. Many factors could cause the Company's actual results or performance to differ materially from those expressed or implied by the forward-looking statements, including the risk factors that are discussed in the Company's Annual Information Form, which is included in our Annual Report on Form 40-F and in our MD&A. You should not place undue reliance on the Company's forward-looking statements. The Company has no intention and undertakes no obligation to update or revise any forward-looking statements, except as required by law.

As is customary during the call, John and Steve will reference non-GAAP numbers in their summary of our quarterly and annual results. For a reconciliation between our GAAP and non-GAAP numbers, please see the earnings press release and supplement published earlier today.

I will now turn the call over to John.

John Chen:

Thank you, Chris. Good morning, everybody. In our second quarter, fiscal quarter, total company revenue was \$261 million. It grew 22% year-over-year. Total Software and Services was \$256 million, growing 30% year-over-year, and driven by double-digit percentage growth in Software and Services billings in the same period. Earnings per share were breakeven and free cash flow was positive, as we continue to increase our investment in product development and go-to-market to drive long-term sustainable growth. All of our businesses performed at or better than our revenue expectations, except for Enterprise Software and Services, or what we call ESS. I will speak more about that later.

We are executing upon the four operational priorities for Fiscal 2020, that we spoke about at our Analyst Day, which many of you have attended. Let me remind you what those are. They are developing BlackBerry Spark, the product; integrate BlackBerry Cylance, first with the UEM product and then with the QNX product; broadening our reach in regulated industry verticals; and expanding into new verticals. Proof points of this execution during the quarter would include the following:

First, the release of BlackBerry Intelligent Security, our initial use case on the Spark platform, with positive validation from both the industry and customers alike. BlackBerry Intelligent Security is the foundation of our Zero Trust Architecture.

Secondly, the integration of Cylance AI technology into our product, with the combined UEM and Cylance product, scheduled for release in early calendar 2020, as we had previously communicated.

Thirdly, new logo wins in ESS and BlackBerry Technology Solutions, or BTS, came in in government, financial services and transportation signifying deeper penetration into regulated industry verticals.

Last, but not least, expansion into new industry verticals, such as in the oil and gas industry.

I will now move to our business commentary, starting with the IoT business. Total IoT revenue declined 5% year-over-year. BTS continued to perform well, with double-digit growth in line with our expectations, offset by softness in our ESS business. The softness in our ESS business is primarily due to the retooling of our salesforce. We anticipate the impact of this retooling to last another two quarters, while we strengthen our go-to-market and increase our pipeline. Our goal of sequential quarterly revenue growth provided last fiscal quarter was pushed out by three months, as the retooling caused some disruption in the development and closure of our pipeline. We believe that the changes we made in sales leadership last quarter and the subsequent changes in other personnel support our objective to increase our reach in existing regulated industry, as well as expansion into new verticals.

Our regulated industry business remains healthy and stable. We added new logo wins in the government vertical, including the U.S. Department of Health and Human Services, the National Assembly in France, and CyberSecurity Malaysia, a government agency under the Malaysian Ministry of Communication and Multimedia. Our FedRAMP cloud Authority To Operate, ATO increased from nine to ten United States government agencies, and the BlackBerry FedRAMP cloud user base increased by 16% since this past March, when we last reported, to approximately 1.4 million users. In the financial verticals, we added the ICBC, the Industrial and Commercial Bank of China, as a new logo, among many others. We also experienced strong growth in the oil and gas industry, a new and developing vertical of focus for BlackBerry.

While we are not satisfied with the short-term results, the timing of these changes is important as we are entering the refreshed cycle of our security and communication products that are well suited for the current security trends. Presently, we are in beta with about 10 customers for BlackBerry Intelligent Security, which we actually announced at the Black Hat Conference. These customers, these 10 customers are interested in the continuous authentication and the adaptive security features of our product. Also, many of our top customers have expressed early interest in the AI-driven mobile threat detection that is natively integrated with the UEM console and other BlackBerry apps. In this evolving security landscape, we believe data and identity, not the network, is the new security parameters.

Now, let me walk through some of the BTS highlights.

BlackBerry QNX continues to represent the vast majority of BTS revenue. All of BlackBerry QNX revenue stream grew year-over-year, notwithstanding the downturn in global auto production. We are encouraged by this trend because our customers are spending increasing amounts on BlackBerry software in current and future auto designs. This will definitely increase our ARPU. The recent announcement with DENSO and Subaru highlights this trend of BlackBerry achieving more content per vehicle. Our jointly developed HMI, human machine interface, digital cockpit system is the first of its kind, and we start to ship in Subaru vehicles this fall in the United States. This leading-edge digital cockpit leverages BlackBerry's QNX Hypervisor, the operating system and the digital instrument cluster, while contributing to greater technological efficiency in the car and a safer experience for the users.

In the quarter, we had a total of 26 design wins. Eight of the design wins were in the automotive market. All of these wins were for our digital cockpits and digital instrument cluster designs. The remaining 18 design wins were in the general embedded market, primarily in the defense industry and medical industry. Further expansion in the general embedded market has been a stated strategic priority this fiscal year.

Our recent announcement with Jaguar Land Rover demonstrates our thought leadership in the automotive software market with the addition of the Cylance AI security capabilities. We have the opportunity to provide the first cybersecurity platform for the auto market. JLR is the first to collaborate

with us. We are working with others in the auto industry and those interactions look promising. The Chief Executive Officer at JLR, Sir Ralf Speth, will deliver the keynote address at our Security Summit in London on October 2 and speak more on the topic. Furthermore, we plan to demonstrate the combined QNX and Cylance capability at CES 2020.

Before I move in to the Licensing, let me briefly talk about our Radar business. In the quarter, we added eight new customers, including Labatt Brewing Company, and we had repeat purchases from a number of our customers, including Lowe's Companies through our partner, Flexivan. We also added Matson after quarter end. This continues to demonstrate the demand for our product in the market.

Moving on to our Licensing business, revenue grew 27% year-over-year, above our expectation, as several IP licensing arrangements occurred earlier than expected. We also anticipate the second half of the fiscal year to be stronger than the first half. For fiscal 2020, we now anticipate growth over last year, instead of the 5% decline, as we previously communicated.

Now, on to Cylance Revenue came in at \$51 million, representing an increase of 24% year-over-year, in line with our expectations. This was driven by approximately a 22% year-over-year increase in the number of active subscription customers, with strength from financial services, manufacturing and professional services industry. Notable wins in the quarter were from ABB, Pioneer Natural Resources, BankUnited, and NASA. Annual recurring revenue was approximately \$170 million and up 21% year-over-year. Dollar-based net retention rate continues to be greater than 100%.

From a product standpoint, CylanceGUARD, our managed detection and response subscription solution, was released this past July. The initial feedback we see from existing customers, partners and interested buyers has been very positive, and it substantiates that GUARD is a comprehensive solution that provides advanced threat hunting and mobile convenience. Our pipeline growth is off to a very good start. With continued innovation, we have a great opportunity to gain share in this \$11 billion plus endpoint security market, currently led by legacy antivirus vendors. The collective market share for all the next-gen, or next generation, endpoint security players, which includes Cylance, is currently less than 10%, so lots of room to grow there.

We acquired Cylance for our strategic vision that we stated last year, which is to secure the Internet of Things. We believe we can deliver on this strategy by combining our strengths in unify endpoint management, endpoint protection, secure communication, embedded systems, as well as AI, onto a single platform. Recent market consolidation validates our early vision and underscores the scale and breadth of technological capabilities that BlackBerry possesses to be a winner in this evolving endpoint security market.

Before I turn this call to Steve, I have some personnel changes to announce. Extending our commitment for growth, I'm pleased to announce that Steve Capelli will move into the role of Chief Revenue Officer. Steve will work with the business leader in IoT and Cylance to drive integrated revenue-generating processes across BlackBerry and assist in the development of our endpoint security go-to-market strategy. Having worked with Steve in the past in a very similar role, he is uniquely qualified with a strong sales experience and knowledge of our market, a full understanding of our strategic goals. Furthermore, I'm pleased to announce that Steve Rai will be promoted to Chief Financial Officer. Steve Rai has been at BlackBerry for five years as Vice President and Corporate Controller, and most recently as the Deputy CFO for the last several quarters, in anticipation of this transition. Steve has an impressive 25-year background as a leader in finance and operations in the technology industry. These changes will take effect as of October 1 of this year.

With that, let me turn the call over to Steve Capelli to provide more detail about our financial performance.

Steve Capelli:

Thank you, John. I'm excited about my new role as Chief Revenue Officer. With the acquisition of Cylance and the leading-edge product launches ahead of us, this is the right time to drive a number of programs to increase the synergies of our products, people and go-to-market activities across all of our businesses. The transition of the CFO role to Steve Rai should be a smooth one, as we have been working on this for a number of quarters.

Now, on to my discussion of our Q2 financial performance. As usual, my comments on our financial performance for the fiscal quarter will be in non-GAAP terms, unless specified otherwise. Please refer to the supplemental table in the press release for the GAAP and non-GAAP details.

We delivered second quarter non-GAAP total company revenue of \$261 million and GAAP total company revenue of \$244 million. I will break down revenue shortly.

Second quarter total company gross margin was 75%. Our non-GAAP gross margin includes software deferred revenue acquired but not recognized of \$17 million and excludes stock compensation expense of \$1 million and restructuring costs of \$1 million.

Operating expenses of \$193 million were down sequentially by \$1 million, as we optimize our spending while investing in product development and go-to-market. Our non-GAAP operating expenses exclude \$36 million in amortization of acquired intangibles and \$2 million in acquisition and integration costs, which collectively represents about \$0.07 of our GAAP loss per share. Additionally, our non-GAAP operating expenses exclude \$13 million in stock compensation expense, \$4 million for software deferred commission expense acquired, \$2 million in restructuring costs, and a benefit of \$23 million related to the fair value adjustment of the convertible debenture.

Non-GAAP operating income was \$2 million and non-GAAP net income was \$1 million. Non-GAAP earnings per share was zero cents in the quarter.

Our Adjusted EBITDA was \$20 million this quarter, excluding non-GAAP adjustments previously mentioned. This equates to an Adjusted EBITDA margin of 8%.

I will now provide a breakdown of our revenue in the quarter. Total Software and Services revenue was \$256 million, representing 98% of total company revenue, broken down as follows: The IoT business accounted for 51% of total revenue, the BlackBerry Cylance business accounted for 20% of total revenue, and the Licensing business accounted for 27% of total revenue. Other revenue is now comprised of Service Access Fees. Service Access Fees were \$5 million, down from \$12 million, or 58%, year-over-year. Total handset device revenue was zero, down from \$5 million, or 100%, year-over-year. Both Service Access Fees and handset device revenue were expected to decline given the continued wind-down of these legacy businesses. Recurring Software and Services revenue, including BlackBerry Cylance, was above 90% in the quarter. We are now modeling recurring revenue to be about 90% for the remainder of Fiscal 2020.

Now, moving to our balance sheet and cash flow performance, total cash, cash equivalents and investments was \$938 million, which increased by \$3 million from May 31, 2019. Our net cash position was \$333 million at the end of the quarter. Free cash flow, before considering the impact of acquisition and integration expenses, restructuring costs and legal proceedings, was positive \$17 million. Cash generated from operations was \$18 million and capital expenditures were \$4 million.

That concludes my comments. I will now turn the call back to John to provide our financial outlook.

John Chen:

Thank you, Steve. Based on the comments on this call, our financial outlook for FY'20 and for the total company year-over-year, non-GAAP revenue growth is in the range of 23% to 25%, driven by a double-digit percentage increase in billings year-over-year. We anticipate BTS and Cylance performance to be in line with the financial outlook we provided at the beginning of Fiscal 2020. We expect the softness in ESS and the retooling of the salesforce to be offset by growth in Licensing. We also continue to expect total revenue and non-GAAP profitability for Fiscal 2020.

I will now open the call for Q&A. Lisa?

Operator:

Thank you. We will now begin the question and answer session. To ask a question, you may press star, one on your telephone keypad. If you are using a speakerphone, please make sure your mute function is turned off to allow your signal to reach our equipment. Again, press star, one to ask a question. We'll pause for just a moment to allow everyone an opportunity to signal for questions. We request that you limit yourself to one question and one follow-up.

Our first question comes from the line of Paul Steep from Scotia Capital. Your line is open.

Paul Steep:

Great. Good morning.

John Chen:

Hi, good morning.

Paul Steep:

Could you talk a little bit more about the management changes you made, anything in particular in terms of the leadership at Cylance or other management changes within the organization, and the focus of those changes going forward?

John Chen:

Yes. You know we made a management change by recruiting Bryan Palma, he's running our IoT Division, and he's been bringing a number of executives in. We have moved our Head of Americas, I guess, to head up Europe, with an emphasis on, obviously, the major markets, like France and Germany and U.K., in addition to expanding our footprint in EMEA—sorry, in the Middle East. We have hired a new sales executive to run Americas, who's very experienced on more of the entrepreneur smaller company. I think his last role, one of his last roles was with LookOut. So, we are hiring a number of key executives, especially in field marketing for lead generation. The list goes on. Bryan is recruiting a new team for growth. So, that's number one.

On the Cylance side, we have promoted Daniel Doimo, who was the Chief Operating Officer for Cylance when we acquired them, to be the President of Cylance. Stuart McClure, unfortunately, after the integration completed, has decided to move on. I would have wanted him to stay longer, but he had made

a personal decision, which we have to respect. However, the bench there are quite strong, both in sales—a gentleman by the name of Dave Castignola, he actually used to run RSA sales for many, many years. I think he's been at RSA, like, 15 to 20 years, it's a very long time, you know, very committed to the mission. The Engineering Team are all intact. The data scientists, the Development Head, the Chief Product Officers are all staying and working very hard at integrating Cylance's business into Cylance's technology with our CTO and our Development Head, so I feel very comfortable with that. In addition to that, the co-founder of Cylance, Ryan Permech, is now the Chief Security Architect of BlackBerry. So, he has actually increased his role. I can't speak for him, but he looks happy. So, that is that.

I finally got rid of Steve Capelli, so that he couldn't bother me at all. Then, I have—obviously, Steve will help out to making sure that we have synergy, really, across different functional units, both in the go-to-market and in the kind of strategic side of the equation. That, of course, also will include what is the other part of the IoT, which is the BTS—I mean, which is the QNX technology. He continues to manage the Licensing program, as well as the Radar program. Of course, because Steve Rai stepped into the CFO job—Steve's been with the Company for, like I said, five years. I helped recruit him, I remember that. He's very qualified to do the job. We've been working this transition for a while, as you can tell, by increasing his involvement and role in the financial side of the house.

So, let me see, have I missed anything, Paul? I think that's about it.

Paul Steep:

That's helpful. The one follow-up, I guess, I'd have, is if we think through the rest of this year for Cylance, are you guys still comfortable with the 25% to 30% growth rate that we talked about on the prior call, or has that sort of moved out a little bit?

John Chen:

No. No, we're still comfortable with the 25% to 30% rate.

Paul Steep:

Perfect, thank you.

John Chen:

Okay, thank you.

Operator:

Our next question comes from the line of Paul Treiber from RBC Capital Markets. Your line is open.

Paul Treiber:

Thanks very much. Good morning.

John Chen:

Good morning.

Paul Treiber:

I just want to focus on the billings growth relative to revenue growth. Billings, I think you've mentioned for the last several quarters now it's been double-digit growth. It seems like a little disconnect versus revenue growth. Can you just elaborate more on billings, perhaps where the strongest growth is in billings, and perhaps maybe on the duration of billings that you're signing, and then, maybe more importantly, when you expect that billings growth to translate to revenue growth?

John Chen:

Most of the billing is on annual, in terms of our contract. There are some that are multi-year, but not the majority of it.

Paul Treiber:

Okay, and honing a bit more into the ESS segment, based on my numbers, it looks like the revenue for ESS is probably down, you know, in the mid-teens, maybe. First, is that correct? Then, just give the high mix of recurring revenue that's in your segment, what would the—does the decline stem primarily in the non-recurring side, or could you speak to the customer renewal rates on the ESS side?

Steve Capelli:

Thanks for the question. When we look at the ESS, your decline numbers are relatively correct in that component. I would not overly emphasise the non-recurring versus the recurring, they're somewhat balanced in the two. We're looking forward to bringing out the new products and bringing the new team onboard, and I think ESS, we can expect, after a couple of quarters, will be back where we wanted it to be.

John Chen:

Yes, I would say that the weakness of ESS is really on execution. We did not do as well in closing the deal, and I think that might be the familiarity of the new people with either the customers or just the process of it. I did not look at it from a breakdown of recurring versus non-recurring at all. In fact, we have not wanted the team to do any non-recurring. Today, when we talk about businesses, we are talking mostly on recurring.

Paul Treiber:

Okay, that's helpful. I'll pass the line.

John Chen:

Thanks.

Operator:

Our next question comes from the line of Daniel Chan from TD Securities. Your line is open.

Daniel Chan:

Hi, good morning.

John Chen:

Good morning.

Daniel Chan:

Just to drill into this ESS business a little bit more, I just want to confirm, are you seeing any changes in the competitive landscape as you go out for these bids?

John Chen:

Yes, we see Microsoft being a little bit more aggressive, but we also have new products coming out that we believe will—I mean, one came out already, the BIS product, and a couple of new products are going to come out in the short term, which is the next six months. We believe we could be very competitive. We have to compete, obviously, but we do see some of the landscape changes.

Daniel Chan:

Okay. Then, on a related note, any thoughts on VMware's acquisition of Carbon Black and your view of how Cylance will compete in your UEM product?

John Chen:

Yes, that's really welcome news for us. First of all, for any of you, and maybe none of you, who thought that we paid too much for Cylance, we actually paid the lowest multiple of all. Carbon Black, I think the transaction was \$2.1 billion, \$2.2 billion, somewhere around that number. Carbon Black is pretty much the same size as Cylance, and we paid \$1.4 billion. That's one thing.

Secondly, I think more important, like I said in the script, it really is a good validation of the strategy of this whole endpoint security market which we are seeing. Customers want one platform now, they don't want multiple platforms, they don't want to do the integration, and they wanted to have anywhere from the MDM all the way to the endpoint security and anti-viral software all in one platform, one console, one agent and one cloud. We believe that is an advantage of BlackBerry. Obviously, VMware will always be a formidable competitor, maybe that's the way to say it. This also helps squeeze out—change the landscape and squeeze out a lot of the one product players, smaller players. So, we absolutely believe the one platform—we see the one platform needs, especially in the big industrial players, and we win there first. So, I thought the VMware/Carbon Black thing was quite logical.

Daniel Chan:

Great, thank you.

Operator:

Our next question comes from the line of Maynard Um from Macquarie. Your line is open.

John Chen:

Hi, Maynard.

Maynard Um:

Good morning. I had a couple of questions. In your release, you talked about QNX being at or better than your expectations. There's a number of interesting dynamics in the auto industry, right? On the one hand, you benefit from a lot of big secular tailwinds in the market and where your content is growing per vehicle, but on the other hand, the global SAR has been weak globally and the auto-related names we cover have all been taking guidance down. So, can you just help us understand the puts and takes. When you say QNX was in line or better, were your expectations already building in end market softness, or is the content growth story coming in much better than you expected?

John Chen:

It's more the latter than the former. We did not factor in the number of auto sales down by 2%, but on the other hand, what we have been seeing is more and more—the higher content of each car is now in software, and because we are well positioned (a) first on the operating system side for the safety functionality, and then expanded more into the cockpit and the display and the ADAS, kind of more of the application layer, and our partnerships with all the Tier 1s, as well as the chip manufacturers, like Nvidia, the NXP, the Qualcomm, so as they increase the content of ECU, or the electronic control unit, in a car, as each of the manufacturers increase the number of software components, that benefits us. The content increase helps us to move the ARPU up.

Maynard Um:

Got it, okay. Then, just separately on ESS, it's down year-over-year, but it also looks down sequentially, as well, and I'm just wondering if we should expect ESS to remain flat from the Q2 levels until the sales management benefits take hold in a couple quarters, or if you think that the new products that are coming to market, BlackBerry Intelligent Security, etc., will help to drive growth in the back half. Thanks.

John Chen:

Yes, the current outlook, it looks like that is going to uptick a little bit in Q3 and Q4, we're going to see a little bit better second half than the first half, but I will be modest about it.

Maynard Um:

Okay, and is that just primarily driven by new product offerings?

John Chen:

It's primarily driven by new products, but it's really not that. A new product always takes six to nine months. The sales cycles are not—it's not as much as that as the salesforce get oriented more correctly and they get more familiar with the account. It's really the time of maturity.

Maynard Um:

Okay, great. Thank you.

John Chen:

Right, thanks.

Operator:

Our next question comes from the line of Todd Coupland from CIBC. Your line is open.

Todd Coupland:

Good morning, everyone.

John Chen:

Hi, Todd.

Todd Coupland:

I just wanted to look out a little bit further. How much of integrating Cylance into ESS is required to get that back on track, and where you expect it, if, in fact, this one platform is the key to winning longer term. So, just talk about your thoughts out past the next couple of quarters.

John Chen:

Yes. We talked about earlier VMware and Carbon Black and the advantage of the platform. Obviously, we have to build that one platform, and how well, how tightly integrated the two organizations is, there's pros and cons in both extremes. Obviously, it's going to have to be tighter than today, that's for sure. This is what the—I mean, all joking aside, this is what Steve Capelli needs to work on, although he doesn't want to, I know, but he has to work on that, because we've got to make sure it's an efficient go-to-market, and also, strategically, it makes us stronger. I would say it remains—you know, a work in progress, maybe that's the way to say it, and hopefully in the next quarter or two we have a much better decision or much better view of that, and we can chat about that then.

Todd Coupland:

Okay, great. Thanks for the color.

John Chen:

Sure.

Operator:

Our final question today will come from the line of James Faucette from Morgan Stanley. Your line is open.

John Chen:

Hey, James.

James Faucette:

Thank you. Good morning, thank you so much. Just a couple of questions. First, when you look at kind of your investment, and that kind of thing, how are you allocating resources? I know you're trying to manage cash flow and earnings, and how are you allocating resources to the different businesses and how are you prioritizing that, Because, I think on top of ESS, I think one of the things that's a little bit concerning

for people is that it looks like Cylance has fallen to roughly flat sequentially and it sounds like you're probably looking for that to improve in the second half of the your fiscal year, but just wondering how you're thinking about allocating resources.

John Chen:

Yes, yes, that's a good question. Currently, the resources are mainly going to Cylance. As you know, they're not making money, but we do keep increasing our investment there, and obviously BTS. Those are the main two engines that we're funding the most, and then we retool the ESS salesforce and balancing the expenses there. Those are the kind of the operating priorities. We are spending—we're hiring a lot of people, especially in sales, both in ESS and Cylance. We are spending as much as we possibly can, but not losing money. That's kind of the operating principle or guideline and keeping a positive cash flow whenever we can.

James Faucette:

Got it. Then, when you look at the increasing sales effort and hiring that you're doing there, how are you thinking about time to productivity, and some of those other metrics, particularly around Cylance and the new Spark platform offering. I'm just wondering how we should think about that ramp and change in trajectory.

John Chen:

On ESS, it's quite traditional, six to nine months sales cycle. So, for a rep to be fully productive, it will probably take a year, because people get in there, learn the principles of the business, the technology behind it, and then we, obviously, hand them over a pipeline which includes new territories, existing account base, and so forth. That process, when you ramp a full person up, it's probably going to take a year, but we would expect to see some kind of progress before that. So, somewhere starting at the six months' mark, we should be seeing some progress, and then a year. That's the design of the platform, the ESS side, and so forth. On the Cylance side, it's a little shorter, probably shorter by a quarter, and the reason is (a) that market is growing and there's a lot of demand there, but, more importantly, their products are more singular purposes, and especially now, what we're pushing to sell is the managed service solution called the GUARD, and the GUARD, usually, is a relatively easier sell than a platform sell, because it's a managed service sell. Those are kind of how we factor in and how we picture it.

James Faucette:

Great, thanks very much.

John Chen:

For sure, thank you.

Operator:

I would now like to turn the call back to John Chen for closing remarks.

John Chen:

Okay. Thank you for all the comments and the questions. In closing, although we are all disappointed with the short-term results, there's no doubt, but, strategically, we are in a very strong position to win the \$22

billion secure IoT software market, as well as the auto market and extension of that. We have great products, and a number of new leading-edge products launching in the next six months. In addition to launching these leading-edge products, we're also working on a number of exciting partnership announcements, so stay tuned. We're also investing heavily in our go-to-market, we just spoke about it just a minute ago, and our focus is now on execution and on growth. Thank you very much for your time today. I'm sure we're going to talk soon.

Operator:

This concludes today's call. Thank you for your participation. You may now disconnect.

I. Thank you for your participation. You may now disconnect.