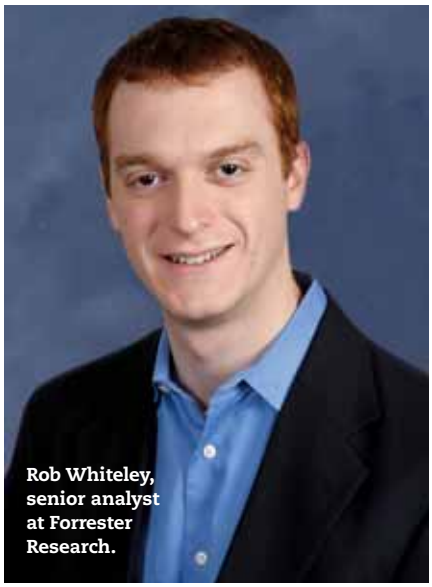
Boosting the user experience


Rob Whiteley, senior analyst at Forrester Research.

ROB WHITELEY is a senior analyst at Forrester Research Inc. and an acknowledged expert in network architecture and operations. He spoke with *F5 World's* editorial director, Bill Laberis.

Q What's the root cause of many application performance problems in the enterprise today?

A Most enterprises act in a very incremental manner when deploying applications. If some new application or an upgrade is needed, they add more server capacity or maybe more storage capacity. Eventually they add the necessary OSs. They keep adding various pieces they need to bring up the application, but it ends up as a very kludgy system. As some of those servers age, or any part in this equation begins to fail, you have massive performance problems.

Q Why does this approach to application deployment exist?

A It's because of the "silo'd" nature of most organizations. Even if they could create a more efficient technical solution, it's difficult to get the application people, the security people, and the network people all together in a room and have them agree on the most graceful solution. But we do see that, as the technologies mature, the network becomes more important. We're beginning to overcome this incrementalism.

Q How do these problems impact the user experience?

A The most common issue is application performance for users moving from LAN interfaces to browser interfaces for applications. What happens when you move to a web-based version? The actual user interface doesn't change radically. You come in through a browser now instead of some application you launched off your desktop. It's a lot slower, with a lot more time spent waiting on the screen. The experience is completely altered and, more importantly, users start finding work-arounds, figuring, "I won't do it the exact way I was supposed to, because I don't want to spend three minutes waiting for that query to return."

Q How good are IT application architects or IT management at recognizing the root causes of performance problems?

A On average, not so good, because there are just so many moving parts involved in the equation. It could be the endpoint machine, it could be the network, it could be the database, the server, or the OS. It's very difficult to accurately assess and detect the root cause. As a result, typically the network gets blamed.

Q What role can the application delivery network play in improving application performance?

A The most important thing it does is what I call the "packets-to-policy migration." It takes the network, which is predominantly a platform meant for pushing packets of data around the network, and exposes it in a more intuitive, policy-driven manner. That's important because the silos within these organizations and the problems that occur are at the application layer. People trying to solve these problems think in terms of policy, not in terms of the underlying traffic. The application delivery network exposes the logic of the network in a way that's more application savvy. It's not just a matter of it exposing a bunch of interesting concepts and policies. It can actually affect change. It can mitigate latency. It can increase bandwidth. It can actually help prioritize your system, increase security—all the things that have to be done at a shared platform level—and it can do that on an application-by-application basis.

Q Do organizations view application performance as an IT issue or a business issue?

A That is the $64,000 question. It should be viewed as a business problem. Most companies don't gather the relevant metrics that allow them to tie performance issues to business outcomes. Companies need to tie outcomes of a poorly performing application to a top- or bottom-line driver in the business. Next, companies need to accurately capture the metrics to make that quantification. Application delivery helps here with the policy-driven infrastructure that can measure applications and allow IT to build application SLAs [service-level agreements].

For a complete transcript of this interview, including more insight on how the application delivery network can improve application performance, go to www.f5.com/beyond-silos.