

CASE STUDY

FiberHome Accelerates New Product Releases

Using Spirents Velocity



Customer Challenge

FiberHome is a global leader in optical communications equipment. In a typical year, FiberHome sets up 20 or more testbeds in its networking test labs for engineering testing as well as post-sales customer support. Due to the volume of testbed standups, FiberHome senior management determined they had to increase overall lab efficiency to make engineers more productive, cut operating expenses, and reduce CapEx. After performing a time and motion study, the team concluded that testbed standup time was the biggest opportunity for improvement since it was taking a week or more to stand up a single testbed.

To provide superior customer service and increase competitiveness, FiberHome's senior management created new efficiency objectives for lab operations. FiberHome's testing department determined that to meet those goals a lab automation platform would be required. With that in mind, they prepared selection criteria and invited vendors to bid. After an extensive evaluation process, they selected Spirent's Velocity solution.

Hu Guohua, the General Manager of FiberHome's Networking business unit said "Spirent was chosen based on providing a very capable and robust automation solution. That gave us confidence that we could efficiently maintain it. We also appreciated Spirent's post-sales delivery capabilities to get everything up and running quickly."

The Velocity solution platform was deployed on schedule by Spirent's lab automation experts, which included a tight integration with FiberHome's existing test platforms and equipment. The implementation completely transformed FiberHome's testbed standup process. Now engineers simply fill out a request via their browser and Velocity does the rest for them. It has cut standup time from over a week to literally a matter of minutes. That enables engineers to spend more time testing thus increasing quality.

By releasing new optical networking equipment significantly faster, they have increased competitiveness.



Spirent was chosen based on providing a very capable and a robust automation solution. That gave us confidence that we could efficiently maintain it. We also appreciated Spirent's post-sales delivery capabilities to get everything up and running quickly.

Hu Guohua

FiberHome Accelerates New Product Releases



Highlights

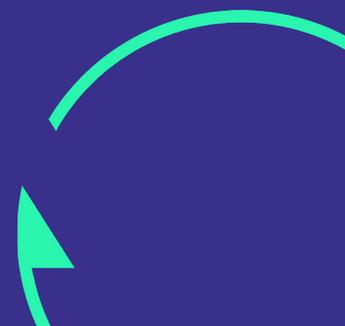
- Leading optical communication supplier wanted to increase engineering productivity and cut capital costs
- The Spirent Velocity solution enabled the provider to reduce testbed standup time by 90%
- 100+ engineers worldwide now reserve the equipment they need and spend their time doing testing versus manual standup



Solution Requirements

Spirent experts worked closely with FiberHome to develop a customized solution to federate and transform their lab into a self-service operation that met the following requirements:

- Reduce testbed stand up and tear-down time in order to maximize user efficiency
- Increase equipment utilization
- Ensure engineers can get the testbed they need, when they need it for testing
- Provide metrics on equipment availability and usage to more effectively drive resource purchase decisions



The Solution

Spirent’s test automation experts in China worked closely with FiberHome’s product verification teams to ensure their test automation needs were met with the Velocity solution. Three main objectives were identified.

1. Increase productivity with automated testbed standup

With each testbed standup requiring a week or more, engineering productivity was being dragged down. That’s because testing couldn’t begin till the testbed was available. Furthermore, since the test assets weren’t being released until the end of the project, expensive resources were being tied up unnecessarily.

The Spirent team worked with FiberHome engineers to identify all the test assets and characterized them within the Velocity database. Doing so enables resources to be selected by class as opposed to by individual ID. This is referred to as resource abstraction. With the resources characterized and abstracted, Velocity was ready to automate everything needed for testing to occur. When a testbed is needed, the engineer makes a reservation and Velocity automatically selects the appropriate resources, networks them together with L1 and/or L2 connections and sets up the required device configurations—all automatically. That freed FiberHome engineers from building testbeds to performing actual testing.

2. Share assets between automated and manual testing to cut CapEx

FiberHome was unable to share assets between automated and manual testing operations. This led to duplication of resources to satisfy both needs. The Velocity solution solved this problem by accepting automated resource reservation requests made via Velocity’s REST API, similarly to those made manually. This enables Fiberhome to maximize resource utilization and drive down CapEx.

3. Provide resource utilization measurement to improve decision making

FiberHome didn’t have an effective means for tracking and reporting asset utilization. This caused equipment shortages as well as overages, neither of which was acceptable. With Velocity, a complete analytics dashboard was delivered for Fiberhome management to accurately gauge equipment usage and trends.

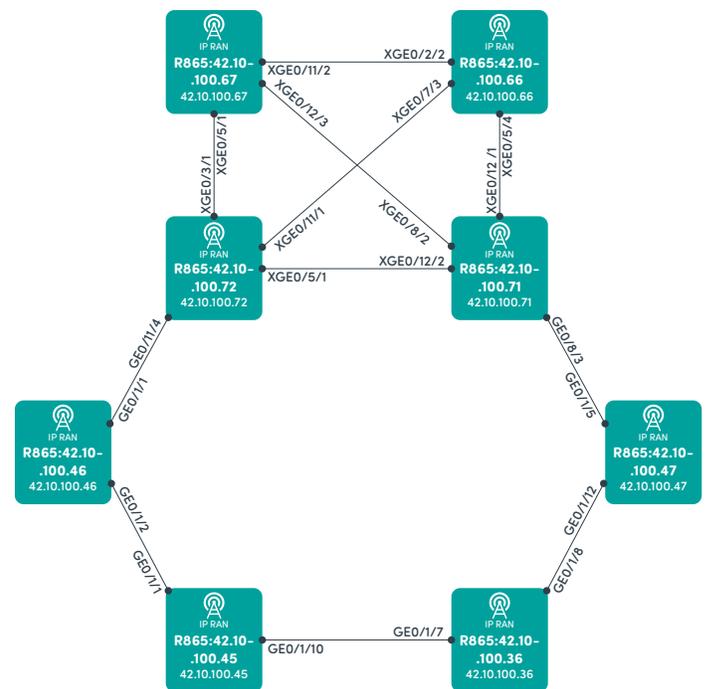
Cut testbed standup time from **1 week** to **5 minutes**

Increased efficiency by **90%**



Velocity’s ability to standup testbeds quickly and efficiently has reduced our testbed standup time by over 90%. This dramatically increased our testing capacity.

Hu Guohua



FiberHome’s testbed topologies are complex with each device having multiple configurations to be managed.