Manage your mission critical VNFs proactively for excellent customer experiences

The journey towards cloudification includes both challenges and opportunities for telco providers. The virtualization of telco services with NFV increases flexibility and enables cost-efficient provisioning. One key challenge that arises in this new dynamic environment is how to meet fluctuations in service demand over time and location. More specifically, telco operators need to decide how much resources to allocate to each VNF, and where and when to deploy instances of these functions to both satisfy user demand and optimize costs.
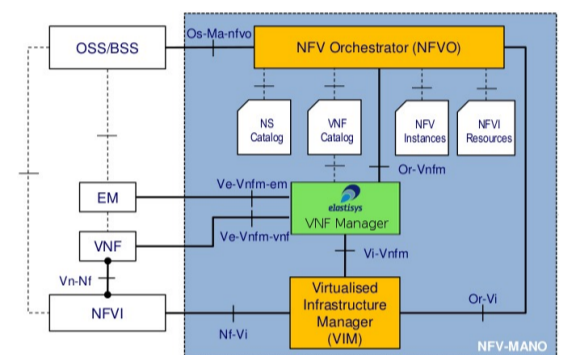
The Elastisys VNF Manager provides orchestration and proactive capacity management for performance critical services. The platform has been proven for years in operation in multiple sectors. For telco providers, the Elastisys VNF Manager is a key component in an NFV orchestration solution and provides robust, high-performing, and cost-efficient management and service assurance of VNFs.
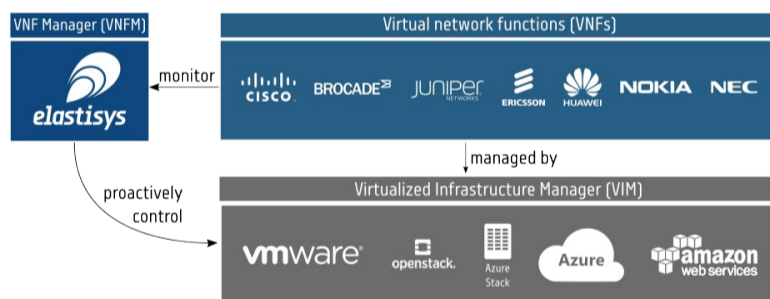
How it works

Elastisys VNF Manager ensures that your services is always running well by provisioning capacity in advance, guaranteeing that the right amount of capacity is always available when needed, not when your operations team realize it and your customers are suffering degraded service performance. To optimize resource usage, the Elastisys platform also gracefully scales down your resources when they are no longer needed.

The Elastisys platform constantly monitors the metrics that are relevant to your services and supports all kinds of system performance metrics out-of-the-box (not only CPU) as well as service specific metrics made available through custom metric collectors. All metrics and orchestration actions can be stored, monitored and visualised through third party tools such as InfluxDB and Grafana.

Not all services are the same and there is no single autoscaling algorithm to rule them all. Every VNF has its own workload patterns (in time and location) and to manage this, the Elastisys VNF Manager is equipped with a collection of internationally patented algorithms to handle recurring load increases, unexpected load bursts and everything in between.

NFV architecture with Elastisys VNF Manager .

The Elastisys VNF Manager is independent of cloud and hypervisor technology and integrates with OpenStack and VMware as well as public clouds such as Amazon, Microsoft, and Google. An additional rendering, the Elastisys CharmScaler, is available through the Canonical Juju orchestration framework where Elastisys can manage any Juju charm/VNF out-of-the-box.

Ensure your customers an excellent experience. Proactively manage the infrastructure of your mission critical VNFs using predictive analytics to increase performance and availability.

Features

- Closed-loop proactive management (instantiation, scaling, updating, termination) and quality assurance of VNFs based on predictive analytics
- Support for managing VNFs based on custom metrics
- Vendor neutral and integrates with all big VIMs and hypervisors
- ETSI compatible with open source APIs

Effects

- Improved customer experience through increased availability and performance of VNFs
- Cost and energy savings by avoiding constantly having to dimension for peak capacity
- Zero-touch operations management for VNFs

About Elastisys

Elastisys products and services extend on decades of internationally leading research in distributed systems, cloud computing, and autonomous management of virtualized resources. Elastisys was founded in 2011 and is a spin-off company from the renown distributed systems research group (www.cloudresearch.org) at Umeå University. In 2017, Elastisys was recognized by the well renowned 33-listan as one of the most promising tech startups in Sweden.