

RackN Physical Layer Automation

For VMware Cloud Foundation

“Automating a single site or cloud is already too hard, and our customers have distributed infrastructures to manage, and edge Computing will bring many more sites! The industry needs a consistent, integrated tool chain that works within and between sites.”

ROB HIRSCHFELD
CEO
RACKN



VMware Cloud Foundation

VMware Cloud Foundation is the hybrid cloud platform for managing VMs and orchestrating containers, built on full-stack hyperconverged infrastructure (HCI) technology.

RackN

RackN Digital Rebar is a stand-alone Infrastructure as Code provisioning platform that integrates deeply into VMware APIs to provide multi-vendor server, storage, and network lifecycle support.



Fast and Easy VCF Setup for the Enterprise

How long does it take you to prepare hardware for a VMware Cloud Foundation deployment? RackN eliminates the manual steps required to install VMware infrastructure from bare metal. Based on the VMware Hardware Compatibility List (HCL), RackN creates automation that eliminates weeks of work to onboard new clusters.

RackN Digital Rebar is a stand-alone Infrastructure as Code provisioning platform that integrates deeply into VMware APIs to provide multi-vendor server, storage, and network lifecycle support. Our proven catalog of automation modules makes it fast and easy to bring up and maintain VMware VCF clusters on your own bare metal and behind your firewall.

How Does RackN Automate Bare Metal?

RackN Digital Rebar is a customer-managed software solution. We make it easy to operate physical infrastructure without any SaaS or remote VPN requirement. Simply install Digital Rebar in your facilities, then download the VMware and appropriate multi-vendor hardware modules for your environment from our extensive catalog of production integrations. RackN is designed for both distributed edge and large-scale enterprise environments with the ability to integrate popular tools, unique needs, and rigorous security requirements

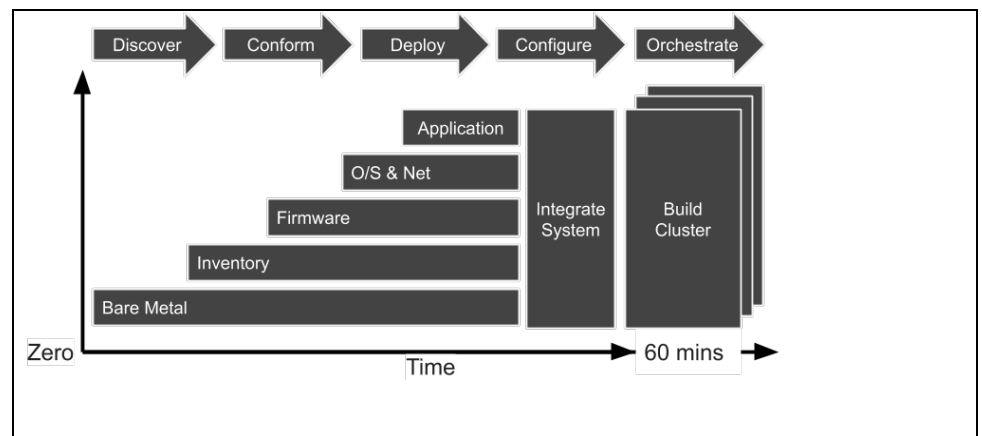


Figure 1: RackN Digital Rebar provisions hardware from server power-on to VCF cluster in less than 60 mins.

RackN enabled a large financial Institution to “repave” their entire infrastructure in just minutes. Digital Rebar enables them to bootstrap deliveries of over 200 machines from first power-on to a completely operational and secure VCF cluster in less than 1 hour.

COMPANY DESCRIPTION

RackN eliminates manual steps required to install VMware infrastructure from bare metal.

- Deploy (or re-deploy) racks of servers each week, even 30 racks per week with 100,000+ server scale.
- Deliver complete Infrastructure as Code

USE CASES

- General Data Center, Service Providers
- Banking, Finance, Government
- Global Enterprises, Telco, Military, Edge Deployments

VMWARE SOFTWARE BUILD OF MATERIALS SUPPORTED

VMware Cloud Foundation v.3.9+, 4.x
 VMware CloudBuilder
 ESXi 6.7, 7.0+

SEE OUR SOLUTIONS IN THE VMWARE MARKETPLACE

<https://marketplace.cloud.vmware.com/services/details/915634a3-4b0d-4dd7-a2c6-68314b1d5290v>

Fully Secure Infrastructure as Code Bare Metal Cluster Automation

Using VMware secure processes and signed components, only RackN is able to deliver a fully automated cluster bootstrapping process and VCF handoff. Our enterprise-proven solution not only verifies, updates and conforms the multi-vendor physical environment pre-installation, the automation integrates deeply with VMware APIs to enable advanced security configurations including end-to-end secure boot.

The RackN platform is both hardware agnostic and amazingly fast. Customers select their best fit hardware vendor(s) and Digital Rebar builds functional vCenter clusters in as little as 30 minutes without any manual intervention.

Key Benefits of Automating Hardware Deployment with RackN

First Mile Installation and Reinstallation for VCF: Preparing infrastructure for a VCF installation is usually a manual, error-prone process requiring weeks of expensive operational or consulting support. RackN is an enterprise-ready solution that will minimize total installation time using automation.

- Zero-touch automation eliminates manual processes.
- Supports multi-vendor, heterogeneous environments, and performs complete RAID, BIOS, and networking setup.
- Automatically integrate validated ESXi installations to VCF without using spreadsheets.
- Enables rapid testing (“repaving”) allowing for iterative validation.
- Enterprise ready: integrates with existing operational platforms including Ansible, Terraform, Bluecat and Infoblox.

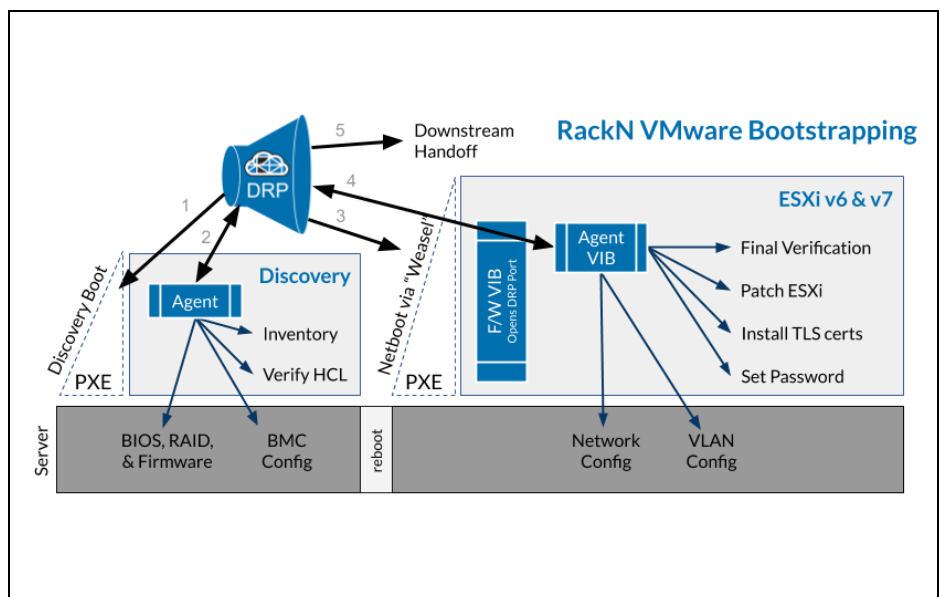


Figure 2: RackN VCF bootstrapping process

Foundational Security that supports VCF Intrinsic Security: RackN improves process controls, compliance, and hardware conformance checks before CloudBuilder begins a VCF installation, enabling the automation of security for the entire infrastructure automation chain.

RackN platform security:

- HTTPS for all API transactions.
- Built-in encrypted storage of sensitive information.
- Auditable system change events.

Enable and verify TPM configuration:

- Zero-touch automation
- Automate existing security requirements
- Update password policies to match existing site requirements
- Install TLS certificate per machine

Multi-Site and Remote Operation: RackN enables the enforcement of consistent operational practice across an entire data center fleet ensuring consistent and repeatable VCF installations, even for remote sites with disparate hardware. The federated management system allows regional and global support without compromising site autonomy.

- Deeply integrated modular Infrastructure as Code allows reuse of components and automation over a wide range of systems.
- Air-Gap ready designs accommodate highly segmented network architectures.
- Federated multi-site control allows consolidated view without compromising remote site autonomy.

Try it now! Download a self-trial

To learn more about how RackN and VMware Product can provide a full lifecycle management of your hardware platform, including complete customization of vSphere ESXi in preparation for VCF HCL conversions, download a free trial at <https://rackn.com/2020/09/16/secure-vmware-sddc-and-vcf> or contact your RackN or VMware partner or sales representative.