

# Night's Watch Crow

Night's Watch Crow DHCP Services, a Minimum Viable Product feature, provides domain host control protocol (DHCP) functionality through multiple implementations (primarily ISC DHCP and dnsmasq), offering comprehensive IPv4 and IPv6 address management services. Key capabilities include:

- Dynamic IP address allocation with lease management
- Fixed address assignments based on MAC or client identifiers
- Support for DHCP options including DNS servers, gateways, NTP servers
- DHCP relay functionality for multi-segment networks
- IPv6 stateful (DHCPv6) and stateless (SLAAC) address configuration
- Subnet declaration with range definition and pool management
- Conditional configuration based on client parameters
- Integration with DNS for dynamic DNS updates
- Lease database maintenance and failover support
- Event script execution for lease events
- Class-based configuration for different client types

The framework supports both simple and complex network configurations, from basic home networks to enterprise environments with multiple subnets and sophisticated address allocation policies.