Release Note

Important Notice:
This firmware upgrade is irreversible. Contact support if issues are encountered after the firmware upgrade.

Version Info:

1. **Firmware Version:** 5.3.1 Build 20260902 Rel. 12726
2. **Applied Model:** EAP225-Outdoor v1.0
3. **Minimum FW Version for Update**: 5.2.5 Build 20260326 Rel. 28988
4. **Fully Adapted Omada Controller version:** 5.14.
5. **Fully Adapted Omada App version:** 5.3.
6. For downloading any firmware version, please refer to Omada Download Center.

New Features:

1. Added support for displaying the configuration synchronization status between the Controller and devices.
2. Added support for the Inform subscription mechanism.
3. Added support for Local Controller cluster deployment.
4. Added support for centralized RADIUS proxy.
5. Added support for configuring the Device Name through the Controller.
6. Added support for displaying the correct Maximum Associated Clients range on the Controller based on the device model.
7. Added support for configuring the wireless mode of devices in Controller mode.
8. Added support for displaying the actual operating channel width of EAPs on the Controller.
9. Added support for cloud-based firmware upgrades in Standalone mode.
10. Added support for logging in to Controller-managed devices through Standalone mode to view status information and perform basic configurations.
11. Added support for Portal Logout.
12. Added support for disabling HTTP in Standalone mode.
13. Added support for DHCP Option 43.
14. Added support for DNS Adoption.
15. Added support for rate limit feature after Portal authentication when used with the Controller.
16. Added support for disabling HTTP, HTTPS, and App discovery in Controller mode.
17. Added support for Non-Stick Roaming feature.
18. Added support for custom channel sets.
19. Added support for multicast and broadcast traffic statistics.
20. Added support for multicast rate limit feature.
21. Added support for multiple RADIUS servers for MAC Authentication.
22. Added support for NAS ID configuration for Enterprise Security.
23. Added support for IPv6 multicast filtering.
24. Added support for EKMS and Unbound MAC PPSK.
25. Added support for Prohibit Wi-Fi Sharing feature.
26. Added support for VLAN Pool.
27. Added support for disabling the Reset button in Controller mode.
28. Added support for configuring an HTTPS URL as the Portal redirect URL on the Controller.

29. Added support for wireless packet capture over the air.
30. Added support for SPAKE2+ authentication and encrypted communication channels, strengthening credential protection and communication security.
31. Added support for device certificates and mutual TLS (mTLS) authentication between devices and the Controller, strengthening device access and communication security.

Enhancements:

1. Optimized overall system stability and operational reliability.
2. Optimized the URL authentication-free entry mechanism.
3. Optimized roaming performance.
4. Optimized transmit power deployment.
5. Optimized brute-force attack protection in App management mode.
6. Optimized the SSH encryption algorithms to improve security.
7. Optimized the Log mechanism.
8. Optimized the Beacon Interval configuration.
9. Optimized security reminders for SNMP Community configuration.
10. Optimized the timing of LLC packet transmission.
11. Optimized PPSK capacity.
12. Optimized the DHCP Vendor Class Identifier format.
13. Optimized the EAP MAC Filter entry capacity.
14. Optimized CLI commands.
15. Optimized the PPSK configuration update mechanism.
16. Optimized the handling of IPv6 RA packets over the wireless interface.
17. Optimized the configuration delivery mechanism for Guest Network.
18. Optimized the DFS channel switching mechanism.
19. Optimized the ACS mechanism.
20. Optimized the background scanning mechanism.
21. Optimized support for multiple RADIUS servers.
22. Optimized the foundational cloud root certificate to meet the requirements of Omada Controller v6.2.
23. Optimized the automatic adoption mechanism to reduce adoption failures.
24. Optimized the configuration synchronization mechanism.
25. Optimized the CoA-ACK/NAK packet caching mechanism.
26. Optimized the device credential verification mechanism to improve authentication security.
27. Optimized cloud platform authentication capabilities to improve account security and access control.

Bug Fixed:

1. Fixed an issue where a security vulnerability existed in the RADIUS protocol.
2. Fixed a TDDP security vulnerability.
3. Fixed a RADIUS security vulnerability.

Additional Information:

1. Adapted for DAC certificates with the DeviceSecret mechanism.