Firefly Seamless Tasmota Protocol Integration

The **Firefly** firmware provides bidirectional **MQTT** integration with Tasmota devices, creating a powerful hybrid automation system. Simply configure your **MQTT** server address in Preferences, and your Firefly device automatically becomes part of your **Tasmota** ecosystem.

Automatic Device Discovery

Your **Firefly** panels are automatically mapped to **Tasmota** device names. When you create a panel called living_room_light, it instantly responds to:

cmnd/living_room_light/POWER → Controls the panel

cmnd/living_room_light/STATUS → Reports panel status

cmnd/living_room_light/DIMMER → Sets brightness levels

Smart Hybrid Architecture

This integration creates an intelligent two-tier automation system:

🔧 *Critical Local Control (Firefly)*

Mission-critical systems operate locally with millisecond response

Safety overrides that work even during network failures

Real-time sensor monitoring without network dependencies

Emergency shutoffs and backup procedures

Example: A water pump and float sensor system runs locally on Firefly, ensuring continuous operation even if WiFi fails, while still accepting remote commands when available.

🌐 *Advanced Automation (Node-RED/Home Assistant)*

Complex multi-device workflows coordinated through **MQTT**

External API integrations (weather, scheduling, notifications)

Centralized dashboards and logging

Non-critical convenience automation

Best of Both Worlds

Network Available: Full remote control and automation

Network Failed: Critical systems continue operating locally

MQTT Down: Direct HTTP control still available

Power Loss: Automatic restart with saved configurations

Integration Benefits

✅ Zero Configuration - Works with existing **Tasmota** infrastructure

✅ Real-Time Monitoring - All **Tasmota** device states visible on Firefly GUI

✅ Fault Tolerance - Critical systems never depend on network connectivity

✅ Unified Control - Single interface for local and remote devices

✅ Backward Compatible - Existing **Tasmota** setups work unchanged

This architecture ensures your automation system is both powerful when connected and reliable when isolated, making it perfect for industrial, agricultural, and residential applications where uptime is critical.