[Courtesy CGPT]

This setup ensures that the Fritzbox remains the primary router, handling internet and Wi-Fi for all devices, and only falls back to the RUT240's G4 connection if the cable internet fails.

1. Configure the RUT240 in Bridge Mode

In this setup, the RUT240 acts as a backup modem and provides internet to the Fritzbox when the primary connection fails.

Steps:

1. **Access the RUT240 Web Interface**:
   - Log into the RUT240's web interface using its IP address (default: 192.168.1.1).
2. **Set the RUT240 to Bridge Mode**:
   - Navigate to **Network > Interfaces**.
   - Configure the **Mobile (G4)** connection in **Bridge Mode**:
   - This disables NAT (Network Address Translation) on the RUT240, effectively passing the internet connection directly to the Fritzbox.
   - Ensure the LAN interface is also correctly configured.
3. **Connect the RUT240 to the Fritzbox**:
   - Use an Ethernet cable to connect the LAN port of the RUT240 to the WAN port of the Fritzbox.

2. Configure the Fritzbox for WAN Failover

The Fritzbox needs to detect and switch to the RUT240's internet connection when the cable internet fails.

Steps:

1. **Set Up WAN Failover**:
   - Go to **Internet > Account Information** in the Fritzbox admin interface.
   - Select the option for **Fallback Connection** or **Use an Existing Connection (LAN)**.
   - This allows the Fritzbox to use the RUT240's internet as a secondary source.
2. **Enable Automatic Failover**:
   - Under **Internet > Account Information**, ensure the Fritzbox is set to monitor the cable internet connection and automatically switch to the backup when the primary fails.
3. **Set Up Monitoring**:
   - Configure the Fritzbox to check the availability of the primary internet connection by pinging a reliable external IP address (e.g., 8.8.8.8).

3. Configure the RUT240 for Minimal Data Usage

To avoid unnecessary G4 data usage:

1. Set a **delay** for failover in the RUT240 (e.g., 2-5 minutes) under **Network > Failover**.
2. Configure a **data limit** under **Network > Mobile > Data Limit**.
3. Ensure **reconnect on failback** is enabled to return to the primary internet connection as soon as it is restored.

4. Optimize the Fritzbox for Local Connectivity

To ensure devices use the Fritzbox Wi-Fi regardless of the internet source:
1. Keep the Fritzbox Wi-Fi active and configured with a consistent SSID and password.
2. Ensure the Fritzbox remains the DHCP server for your network to maintain seamless device connectivity.

Advantages of This Approach

1. **Seamless Primary Operation**:
   - The Fritzbox continues to operate as the primary router, managing the internet and Wi-Fi for all devices.
2. **Efficient Failover**:
   - The RUT240 provides a backup connection only when needed, minimizing G4 data usage.
3. **Simplified Network Management**:
   - All devices remain connected to the Fritzbox Wi-Fi, reducing the complexity of switching networks.