

PipeWire + WirePlumber Automatic Routing for SuperCollider

This document explains how to configure PipeWire and WirePlumber so that SuperCollider, started via pw-jack, automatically connects to Bluetooth headphones, HDMI output, and a named USB sound card on boot.

1. Ensure WirePlumber is Running

```
systemctl --user status wireplumber
```

2. Identify Audio Node Names

```
pw-cli ls Node
```

3. Create WirePlumber Routing Rules

```
mkdir -p ~/.config/wireplumber/main.lua.d
```

A. SuperCollider Auto-Routing (50-supercollider-routing.lua)

```
rule = {
  matches = {
    {
      { "application.name", "matches", "SuperCollider" },
    },
  },
  apply_properties = {
    ["node.autoconnect"] = true,
    ["target.object"] = {
      "bluez_output.*a2dp-sink",    -- Bluetooth headphones
      "alsa_output.*hdmi.*",       -- HDMI output
      "alsa_output.usb-*"          -- USB sound card
    }
  }
}

table.insert(alsa_monitor.rules, rule)
```

B. Bluetooth Auto-Connect (40-bluetooth.lua)

```
bluez_monitor.properties = {
  ["bluez.autoconnect"] = true
}
```

4. Start SuperCollider Automatically

Create a systemd user service to launch SuperCollider using pw-jack after PipeWire and WirePlumber.

5. Restart and Verify

Restart WirePlumber and reboot. Devices should auto-connect and SuperCollider should route automatically.

6. Debugging

Use `WIREPLUMBER_DEBUG=policy systemctl --user restart wireplumber` and `journalctl --user -u wireplumber -f` to monitor behavior.