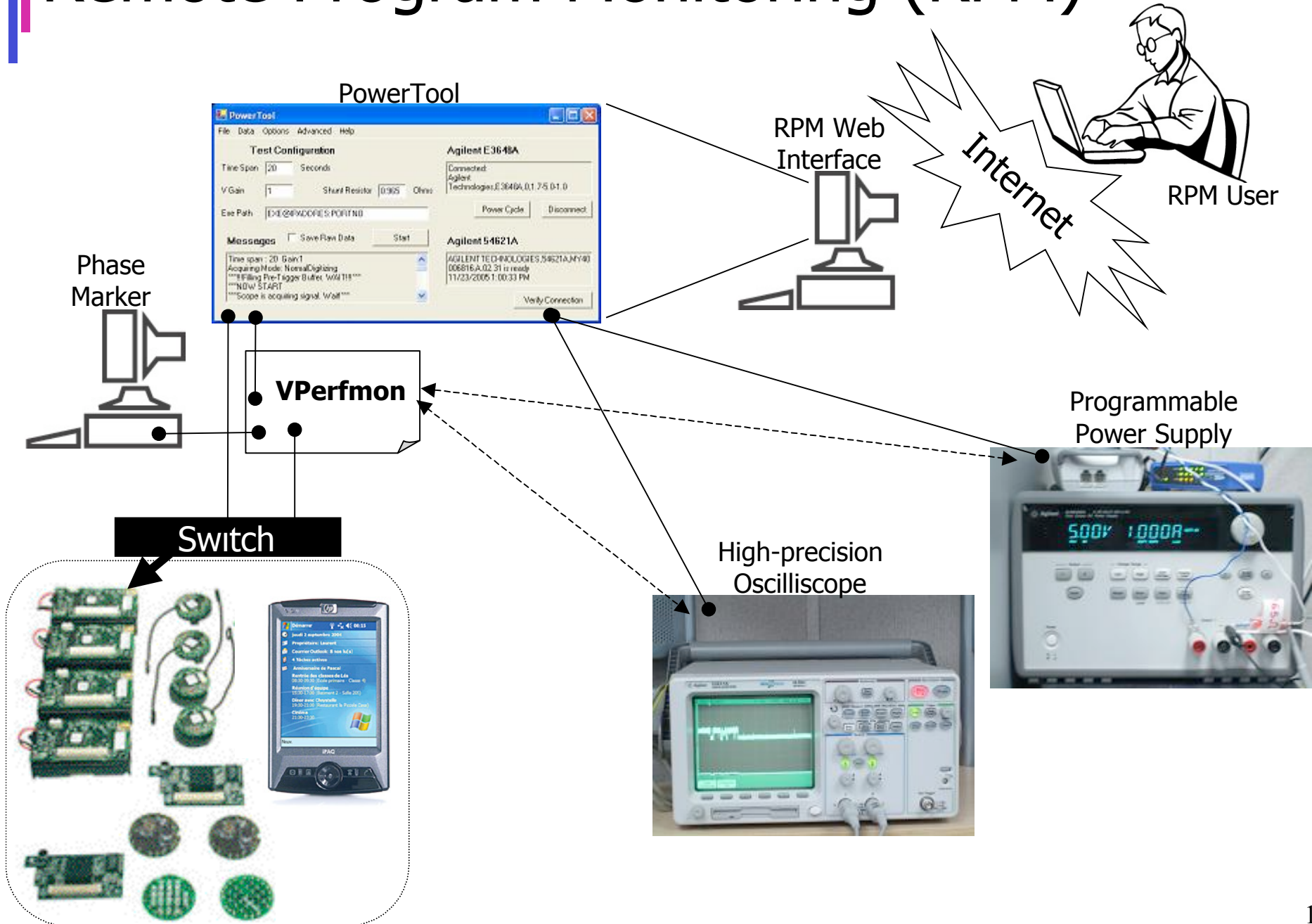


# Remote Program Monitoring

- Accurate monitoring of power/energy
  - Simulation (limited accuracy, CPU only)
  - Battery monitors (course grained, inaccurate)
  - High-end, accurate, high-resolution, external tools
    - ▶ Multimeters, oscilloscopes, programmable power supplies
    - ▶ However, non-sharable, inflexible, and expensive
    - ▶ Power/energy only, not coupled with CPU metrics
- RPM
  - Remote access to high-end toolset and devices
  - Flexible job management
  - Coupled with CPU metrics and phase extraction



# Remote Program Monitoring (RPM)



# Using RPM for Performance Analysis

