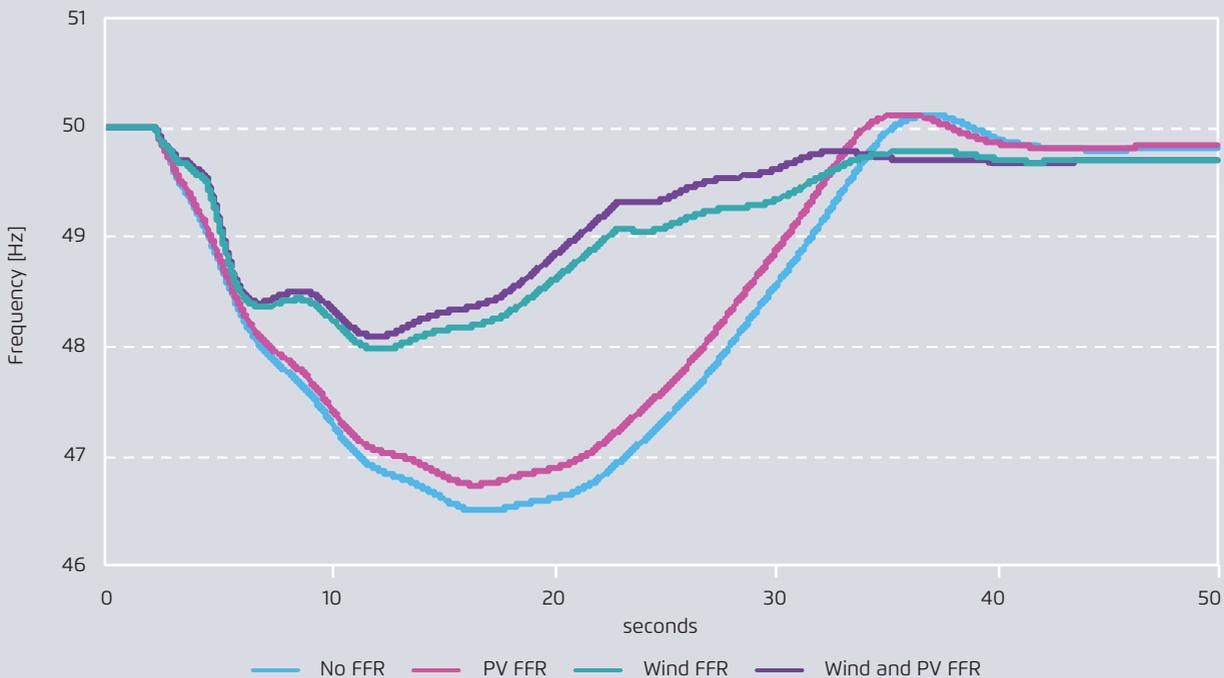


Frequency response by FFR technology after a 1,500 MW generation loss in eastern Japan in the higher RE scenario

Figure 11



| No. | Snapshots | RoCoF (Hz/s) | | | | Frequency nadir (Hz) | | | |
|-----|------------------------|--------------|----------|--------|---------------|----------------------|----------|--------|---------------|
| | | No FFR | Wind FFR | PV FFR | Wind & PV FFR | No FFR | Wind FFR | PV FFR | Wind & PV FFR |
| S1 | Low_VRES | -0.063 | -0.046 | - | - | 49.439 | 49.617 | - | - |
| S2 | Med_VRES | -0.079 | -0.072 | - | - | 49.213 | 49.32 | - | - |
| S2b | High_VRES high load | -0.146 | -0.135 | - | - | 48.626 | 48.68 | - | - |
| S3 | High_VRES low load | -0.342 | -0.222 | -0.324 | -0.208 | 46.498 | 47.974 | 46.739 | 48.091 |