Table 1: Specifications of second generation electromechanical and first generation pneumatic knee simulators.

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|  | **Electromechanical knee simulator** | **Pneumatic knee simulator** [**25**](#_ENREF_25)**.** |
| Fully controllable independent axes | five | three(FE linked axis) |
| Operating frequency | up to 2.0 Hz | up to 2.0 Hz |
| Flexion extension | up to ± 90° | up to ± 90° |
| Anterior posterior | up to ± 25 mm | up to ± 13 mm |
| Internal external  | up to ± 25° | up to ± 10° |
| Adduction abduction | up to ± 10° fully controllable or passive | up to ± 10° passive |
| Medial lateral | up to ± 10 mm pre-defined/fixed | up to ± 10 mm pre-defined/fixed |
| Axial loading | up to 5 kN | up to 5 kN |