Present Design of ELIOS Electron Linac Injector of SOLEIL SR Ring*, R. CHAPUT, M.A. TORDEUX, LURE; C. BOURAT, THOMSON-CSF - This conventional 100 MeV Sband linac, feeding a synchrotron booster, was designed keeping in mind the excellent reliability required. This led us to take two klystrons and two accelerating structures. The goal was to be able at any time to yield an useful beam of 65 MeV in case of one klystron failure. The study aim was to keep a good beam behaviour and a small emittance into both filling mode: short pulses for single bunch and long pulse for multibunch. Linac conceptual design and beam simulation results are presented.

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