

Title (en)
DOOR DRIVE MECHANISMS FOR SUBSTRATE CARRIER AND LOAD LOCK

Title (de)
TÜRANTRIEBSVORRICHTUNG FÜR SUBSTRATTRÄGER UND LADUNGSSCHLEUSE

Title (fr)
MECANISME D'ENTRA NEMENT DE PORTE DESTINE A UN BOITIER DE TRANSPORT DE SUBSTRATS ET A UN SAS DE CHARGEMENT

Publication
EP 0886617 A1 19981230 (EN)

Application
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- US 49885995 A 19950706
- US 49898795 A 19950706

Abstract (en)
[origin: WO9702199A1] A system is provided for batch loading semiconductor wafers into a load lock (22) from a portable carrier (32). The carrier is supported adjacent a load lock chamber. A multilevel end effector (84) associated with the load lock chamber includes a plurality of spaced end effector sets (92). The wafers are engaged and simultaneously retrieved as a grouping, then held in the load lock chamber for subsequent transport, one at a time, into an adjacent transport chamber (28). After transfer of the plurality of wafers from the carrier to the load lock chamber, the carrier and the load lock chamber are sealed and the load lock chamber and transport chambers are evacuated. A variety of mechanisms are provided for moving the end effector sets, and for moving a carrier door (44) and a load lock door (80) between closed and open positions and to a parked position. Mechanisms are also provided for individually moving a carrier door and a load lock door between closed and open positions and then, as a unit, to a parked position.

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