

4D-Nucleofector™ LV Unit For Large-Scale Transfection



Efficient, Closed and Scalable Transfection

Experience the new functional unit for the 4D-Nucleofector™ System which expands our proven 4D-Nucleofector™ System to larger scale transfection.

The LV Unit allows for closed, scalable transfection of larger cell numbers in the range of 1×10^7 to 1×10^9 cells. Transfection protocols can be established in smaller scale using the X Unit and subsequently transferred to the LV Unit without the need for re-optimization. Transferability has been tested for various cell types, including human T cells, CHO-S, HEK293-S, or K562.

Benefit from

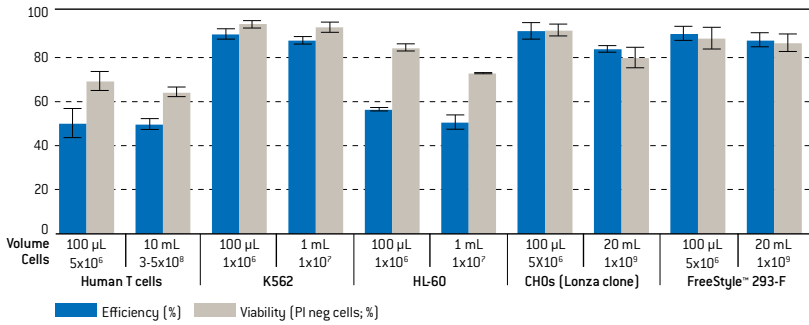
- **Closed system** – Sterile Nucleofection of up to 10^9 cells
- **Real scalability** – Optimization in small scale
- **Established protocols** – Benefit from 700+ optimized cell types
- **Simple handling** – Minimal training needs
- **4D-Nucleofector™ LogWare** – Optional operation via 21CFR part11 compliant software



4D-Nucleofector™ System with Core and LV Unit and mounted LV Nucleocuvette™ Cartridge

[Contact your local sales representative for more information.](#)

Transferability From Small to Large-Scale



Comparison of various exemplary cell types transfected with pmaxGFP™ Vector in small volume (100 µL Nucleocuvette™ Vessels) or larger volumes (1 mL or LV Nucleocuvette™ Cartridge) using the same conditions. Data represent the mean of various independent experiments.

Two Formats Available



1 mL Nucleocuvette™ Cartridge

- 1 mL filling volume
- Up to 1x10⁸ cells
- Manual filling via sterile injection port



LV Nucleocuvette™ Cartridge

- Up to 20 mL processing volume (in 1 mL steps)
- Up to 1x10⁹ cells
- Automatic filling via reservoirs or bags

Applications

- Ex-vivo modification of human primary cells for cell therapy applications (e.g. genome editing, generation of CAR-T cells)
- Transient production of potential therapeutic proteins or antibodies for construct screening
- Generation of large numbers of transiently modified primary cells for cell-based assays

Ordering Information

Cat. No.	Product Name	Description
Devices		
AAF-1002B	4D-Nucleofector™ Core Unit	
AAF-1002X	4D-Nucleofector™ X Unit	
AAF-1002L	4D-Nucleofector™ LV Unit	Including 2 LV Reservoir Racks
Kits		
V4LC-2002	SF Cell Line 4D-Nucleofector™ LV Kit L	1 mL Nucleocuvette™ Cartridge (2 reactions)
V4LC-2020	SF Cell Line 4D-Nucleofector™ LV Kit XL	LV Nucleocuvette™ Cartridge (1 reaction)
V4LC-2520	SF Cell Line 4D-Nucleofector™ LV Kit XL	LV Nucleocuvette™ Cartridge (5x1 reaction)
V4LP-3002	P3 Primary Cell 4D-Nucleofector™ LV Kit L	1 mL Nucleocuvette™ Cartridge (2 reactions)
V4LP-3020	P3 Primary Cell 4D-Nucleofector™ LV Kit XL	LV Nucleocuvette™ Cartridge (1 reaction)
V4LP-3520	P3 Primary Cell 4D-Nucleofector™ LV Kit XL	LV Nucleocuvette™ Cartridge (5x1 reaction)
Accessories		
AAK-2003	4D-Nucleofector™ LV Reservoir Rack	1
SAAF-1001	4D-Nucleofector™ LogWare	
V4LR-1001	4D-Nucleofector™ LV Reservoirs	2

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