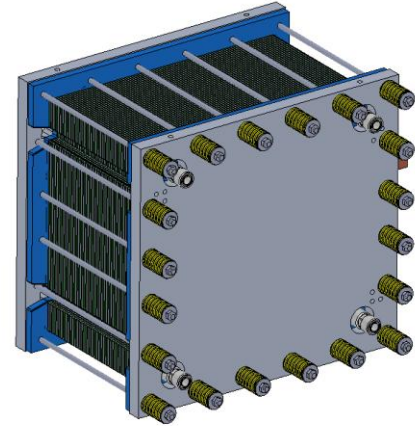


# INO-HUB Energy Redox Flow Stack – Target Values

## Technical Datasheet



		Stack
<b>Battery technology</b>		Vanadium Redox Flow Battery
<b>Electrical Data</b>		
Rated charge/discharge DC power		9 kW
Max. charge/discharge DC power		13.5 kW
Voltage range		32V – 64V
Rated Current		159 A
Resistance <sup>1</sup>		30 mΩ
Number of cells		40
Active Area		40480 cm <sup>2</sup>
<b>Efficiencies</b> @ 100% constant rated DC power		
Energy Efficiency <sup>2</sup>		80%
Voltage Efficiency <sup>2</sup>		82%
Coulombic Efficiency <sup>2</sup>		97%
<b>Hydraulic Data</b>		
Rated Pressure		1 bar
Max. pressure		1.5 bar
Typical flow rate per side		30 L/min
Max. flow rate per side		40 L/min
Pipe connection		20 mm
<b>Mechanical data</b>		
Dimensions (l x b x h)		514 mm x 600 mm x 616 mm
Weight empty/filled		156 kg/ xxx
<b>General</b>		
Electrolyte solution		Vanadium Electrolyte (1.6-1.7M)
Electrolyte temperature range		0 °C ... + 40 °C
Cycle life		> 20.000

<sup>1</sup> @SOC50, 9kW, 35°C

<sup>2</sup> Refers to standard cycle: 9kW charge/discharge, SOC15-85, 32-64V, 35°C, 30L/min