



Wels, September 16th 2020

POSITIVE AND NEGATIVE SEQUENCE IMPEDANCES

Fronius International GmbH

hereby confirms that the Fronius inverters with LVRT capability like

- / **Fronius Symo 10.0-3 – 24.0-3 480**
- / **Fronius Symo 10.0-3 – 12.0-3 208-240**
- / **Fronius Symo Advanced 15.0-3 – 24.0-3 480**
- / **Fronius Symo Advanced 10.0-3 – 12.0-3 208-240**
- / **Fronius Primo 3.8-1 – 15.0-1 208-240**

and Voltage Ride Through activated with a k-Factor set to 2 for positive and negative sequence, do control the short circuit current in a way to get the following impedances:

Impedance	Reactance	Resistance
Positive sequence sub-transient $Z''1$	0,5 p.u.	~0 p.u.
Positive sequence transient $Z'1$	0,5 p.u.	~0 p.u.
Positive sequence synchronous $Z1$	0,5 p.u.	~0 p.u.
Negative sequence sub-transient $Z''2$	0,5 p.u.	~0 p.u.
Negative sequence transient $Z'2$	0,5 p.u.	~0 p.u.
Negative sequence synchronous $Z2$	0,5 p.u.	~0 p.u.
Zero sequence $Z0; Z'0; Z''0$	No zero sequence current possible -> ∞ (or 1000)	

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