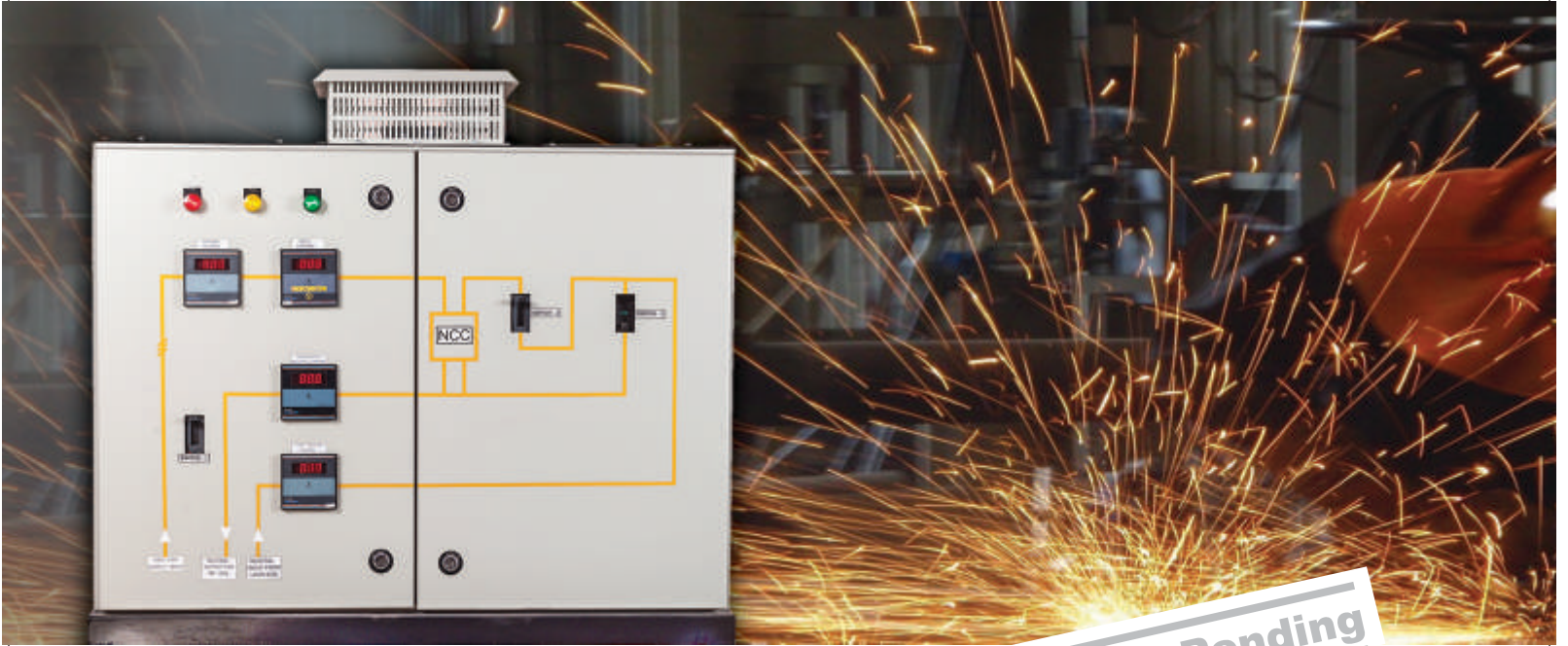


Shreem



Patent Pending

Neutral Current Compensator



Shreem Electric Ltd.

Neutral Current Compensator

Most of the electrical systems now a days are equipped with non-linear and unbalanced loads likes ac/dc drives, computers, UPS, welding loads etc. causing unbalanced current flowing through neutral, degrading the system performance. To avoid unwanted effects of unbalanced currents Shreem has introduced a new Product 'Neutral Current Compensator (NCC)' which is very reliable solution and economic Product and a step ahead in direction to improve Power Quality.

Effects

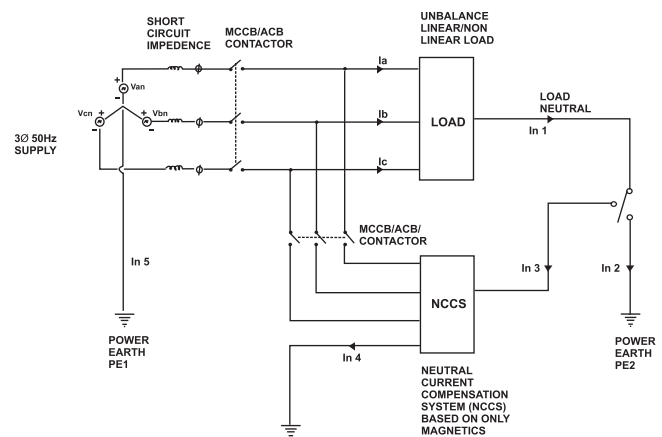
- Heating of neutral cable or bus
- Raising of neutral potential with respect to earth (zero) potential based on earth resistance and neutral current at the supply connection as well as at the load connection.
- Unbalance in Phase to Neutral supply voltages
- Disturbance in synchronization voltages supplied to Active Power Electronic Converters
- Voltage disturbances to other loads connected on the same bus.

Salient Features :

- Reduces the earth current and supply neutral current to near zero irrespective of the unbalanced load neutral current caused by Linear as well as Non-linear loads.
- Helps in retaining supply neutral voltage near to earth zero potential even for large earth resistances or when supply neutral gets disconnected for some reason (which avoids tripping or damaging of sensitive loads connected to the same supply bus)
- Use of only magnetic components (no active device based power converter)
- Easy to manufacture and commission
- Reliable and robust (fit and forget)
- Very economical
- Rating : Depends upon system voltage and maximum load neutral current already existing at the installation. However, in general could be 25 to 33% of load kVA.
- Reduces triplen harmonics (3rd, 9th, 15th), and eliminates main problems in the electrical installations

Applications :

- Distribution systems or networks
- Welding loads
- Software parks
- High rise buildings
- Arc furnace
- Large single phase systems (Example : Railways)
- Substations



Performance Table :

SYSTEM VOLTAGE : 3Ø, 415 V, 50 Hz Ia, Ib, Ic = 200 A (max)					
CONDITION	In1	In2	In3	In4	In5
Normal Connection Load Neutral Earthed at PE2	30 A	30 A	0	0	30 A
Load Neutral Disconnected From Earth PE2 and Connected to NCCS	30 A	0	30 A	0	0

Shreem Electric Ltd.

Corporate Office :

P. B. No. 43, Industrial Estate,

Jaysingpur - 416 144

Dist. : Kolhapur, Maharashtra, (INDIA)

Tel : +91-2322-221021/22/24/45

Fax : +91-2322-221023

e-mail : info@shreemelectric.com

Web : www.shreemelectric.com