



□□□□□

## Eaton 193486

Eaton Moeller series xEffect - FRBm6/M  
RCBO - residual-current circuit breaker with  
overcurrent protection. RCBO D 16A 1+N  
30mA sensitivity F, G

□□□□

|                                 |                                                                                                                      |
|---------------------------------|----------------------------------------------------------------------------------------------------------------------|
| <b>PRODUCT NAME</b>             | Eaton Moeller series<br>xEffect - FRBmM RCBO -<br>residual-current circuit<br>breaker with overcurrent<br>protection |
| <b>CATALOG NUMBER</b>           | 193486                                                                                                               |
| <b>PRODUCT<br/>LENGTH/DEPTH</b> | 80 mm                                                                                                                |
| <b>PRODUCT HEIGHT</b>           | 75 mm                                                                                                                |
| <b>PRODUCT WIDTH</b>            | 35 mm                                                                                                                |
| <b>PRODUCT WEIGHT</b>           | 0.198 kg                                                                                                             |
| <b>COMPLIANCES</b>              | CE Marked<br>RoHS conform                                                                                            |
| <b>CERTIFICATIONS</b>           | CE<br>EN45545-2<br>IEC 61373                                                                                         |



Powering Business Worldwide

## □□□□

|                                                                      |                                                                     |
|----------------------------------------------------------------------|---------------------------------------------------------------------|
| <b>VOLTAGE RATING</b>                                                | 240 V - 240 V                                                       |
| <b>SURGE CURRENT CAPACITY</b>                                        | 3 kA                                                                |
| <b>VOLTAGE TYPE</b>                                                  | AC                                                                  |
| <b>WIDTH IN NUMBER OF MODULAR SPACINGS</b>                           | 2                                                                   |
| <b>FEATURES</b>                                                      | Concurrently switching N-neutral<br>Anti- nuisance tripping version |
| <b>OPERATING AMBIENT TEMPERATURE - MAX</b>                           | 40 °C                                                               |
| <b>OPERATING AMBIENT TEMPERATURE - MIN</b>                           | -25 °C                                                              |
| <b>RATED CURRENT</b>                                                 | 16 A                                                                |
| <b>RATED OPERATIONAL CURRENT FOR SPECIFIED HEAT DISSIPATION (IN)</b> | 16 A                                                                |
| <b>RATED SWITCHING CAPACITY (IEC/EN 60947-2)</b>                     | 15 kA                                                               |
| <b>BUILT-IN DEPTH</b>                                                | 75.5 mm                                                             |
| <b>CURRENT LIMITING CLASS</b>                                        | 3                                                                   |
| <b>RATED SHORT-CIRCUIT BREAKING CAPACITY (EN 60947-2)</b>            | 10 kA                                                               |
| <b>AMBIENT OPERATING TEMPERATURE - MAX</b>                           | 40 °C                                                               |
| <b>AMBIENT OPERATING TEMPERATURE - MIN</b>                           | -25 °C                                                              |
| <b>FAULT CURRENT RATING</b>                                          | 0.03 A                                                              |
| <b>NUMBER OF POLES (PROTECTED)</b>                                   | 1                                                                   |
| <b>NUMBER OF POLES (TOTAL)</b>                                       | 2                                                                   |
| <b>RATED OPERATIONAL VOLTAGE (UE) - MAX</b>                          | 240 V                                                               |
| <b>RATED SHORT-CIRCUIT BREAKING CAPACITY (IEC 60947-2)</b>           | 10 kA                                                               |
| <b>BASIC FUNCTION</b>                                                | Combined RCD/MCB devices                                            |
| <b>MOUNTING METHOD</b>                                               | DIN rail                                                            |
| <b>RATED IMPULSE WITHSTAND VOLTAGE (UIMP)</b>                        | 4 kV                                                                |
| <b>DEGREE OF PROTECTION</b>                                          | IP20                                                                |

## □□

|      |                                                                       |
|------|-----------------------------------------------------------------------|
| □□□□ | <a href="#">xEffect_FR_RCCB_FAZ%20MCB.pdf</a>                         |
| □□□□ | <a href="#">eaton-xeffect-frbm6-rcbo-catalog-ca003015en-en-us.pdf</a> |
|      | <a href="#">eaton-xeffect-frbm6m-3d-drawing-007.jpg</a>               |
|      | <a href="#">eaton-xeffect-frbm6m-dimensions.jpg</a>                   |
| □□   | <a href="#">eaton-xeffect-frbm6m-wiring-diagram.jpg</a>               |
|      | <a href="#">eaton-xeffect-frbm6m-characteristic-curve.jpg</a>         |

|                                                                |                                                                |
|----------------------------------------------------------------|----------------------------------------------------------------|
| <b>OVERVOLTAGE CATEGORY</b>                                    | III                                                            |
| <b>POLLUTION DEGREE</b>                                        | 2                                                              |
| <b>LEAKAGE CURRENT TYPE</b>                                    | A                                                              |
| <b>RELEASE CHARACTERISTIC</b>                                  | D                                                              |
| <b>FREQUENCY RATING</b>                                        | 50 Hz                                                          |
| <b>RATED INSULATION VOLTAGE (UI)</b>                           | 500 V                                                          |
| <b>CONNECTABLE CONDUCTOR CROSS SECTION (SOLID-CORE) - MIN</b>  | 1 mm <sup>2</sup>                                              |
| <b>CONNECTABLE CONDUCTOR CROSS SECTION (SOLID-CORE) - MAX</b>  | 25 mm <sup>2</sup>                                             |
| <b>CONNECTABLE CONDUCTOR CROSS SECTION (MULTI-WIRED) - MIN</b> | 1 mm <sup>2</sup>                                              |
| <b>CONNECTABLE CONDUCTOR CROSS SECTION (MULTI-WIRED) - MAX</b> | 25 mm <sup>2</sup>                                             |
| <b>RATED SHORT-CIRCUIT BREAKING CAPACITY (EN 61009)</b>        | 10 kA                                                          |
| <b>RATED SHORT-CIRCUIT BREAKING CAPACITY (EN 61009-1)</b>      | 10 kA                                                          |
| <b>NUMBER OF POLES</b>                                         | Single-pole + N                                                |
| <b>DISCONNECTION CHARACTERISTIC</b>                            | Undelayed                                                      |
| <b>TYPE</b>                                                    | RCBO                                                           |
| <b>APPLICATION</b>                                             | Switchgear for industrial and advanced commercial applications |

|                 |
|-----------------|
| PROJECT NAME:   |
| PROJECT NUMBER: |
| PREPARED BY:    |
|                 |



  Eaton House  
30 Pembroke Road  
Dublin 4,    
Eaton.com

© 2025    

Follow us on social media to get the latest product and support information.

