

# Declaration of Performance according regulation (EU) Nr. 305/2011 for building products (CPR-Construction Products Regulation)



DOP-No. 0432 CPR 00117-21/DOP\_DW-ALKON/February 2018

## 1 Multiwall system chimney according DIN EN 1856-1:2009 of type

Product designation:

**DW-ALKON**

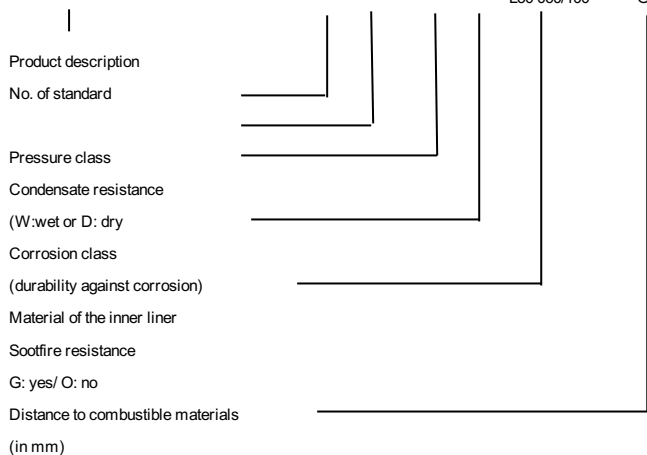
(Tradename)

## 2 Type-, charge or serial no. or other mark for identification of the building product according article 11 paragraph 4:

Product information of the manufacturer

DN

| 0.1 | Metal system chimney | EN     | T   | P1 | W | V2          | O(20)  | 80-300  | multiwall chimney with 30-100 mm insulation |
|-----|----------------------|--------|-----|----|---|-------------|--------|---------|---|
|     |                      | 1856-1 | 200 |    |   | L50 050     | O(30)  | 301-450 | ventilated, without shaft                   |
|     |                      |        |     |    |   | L50 060/100 | O(40)  | 451-600 |   |
| 0.2 | Metal system chimney | EN     | T   | N1 | D | V3          | G(60)  | 80-300  | multiwall chimney with 30-100 mm insulation |
|     |                      | 1856-1 | 400 |    |   | L50 050     | G(90)  | 301-450 | ventilated, without shaft                   |
|     |                      |        |     |    |   | L50 060/100 | G(120) | 451-600 |   |
| 0.3 | Metal system chimney | EN     | T   | H1 | W | V2          | O(40)  | 80-300  | multiwall chimney with 30-100 mm insulation |
|     |                      | 1856-1 | 400 |    |   | L50 050     | O(60)  | 301-450 | ventilated, without shaft                   |
|     |                      |        |     |    |   | L50 060/100 | O(80)  | 451-600 |   |
| 0.4 | Metal system chimney | EN     | T   | H1 | W | V2          | O(50)  | 80-300  | multiwall chimney with 30-100 mm insulation |
|     |                      | 1856-1 | 600 |    |   | L50 050     | O(75)  | 301-450 | ventilated, without shaft                   |
|     |                      |        |     |    |   | L50 060/100 | O(100) | 451-600 |   |
| 0.5 | Metal system chimney | EN     | T   | H1 | D | V3          | G(60)  | 80-300  | multiwall chimney with 30-100 mm insulation |
|     |                      | 1856-1 | 600 |    |   | L50 050     | G(90)  | 301-450 | ventilated, without shaft                   |
|     |                      |        |     |    |   | L50 060/100 | G(120) | 451-600 |   |



## 3 Intended use or uses of the construction product, in accordance with the applicable harmonised technical specification, as foreseen by the manufacturer:

**Convey the products of combustion from heating appliances to the outside atmosphere**

## 4 Where applicable, name and contact address of the authorised representative whose mandate covers the tasks specified in Article 12(2):

**Joseph Raab GmbH & Cie. KG**  
 Gladbacher Feld 5, D-56566 Neuwied  
 Tel.: +49(0) 2631 913-0 Fax: +49(0) 2631 913-145  
 E-Mail: info@raab-gruppe.de  
 Internet: www.raab-gruppe.de

## 5 Where applicable, name and contact address of the authorised representative whose mandate covers the tasks specified in Article 12(2):

**Not applicable**

## 6 System or systems of assessment and verification of constancy of performance of the construction product as set out in CPR, Annex V:

**System 2+**

## 7 Notified factory production control certification body



performed the initial inspection of the manufacturing plant and of factory production control and the continuous surveillance, assessment and evaluation of factory production control and issued the certificate of conformity of the factory production control.

8 Declared performance

| Ifd. Nr. | Essential characteristics | Performance according EN 1856-1  | Values / Classes  | harmonised technical specification/other informations        |
|----------|---------------------------|--|---|--|
| 1.0      | Compressive strength      | <b>Version 0.1-0.5</b><br>for<br>Tubes, fittings and<br>wall bands   | DN80-300 up to 203 m<br>DN301-450 up to 75 m<br>DN351-600 up to 51 m                                      | EN 1856-1<br>Consider anchor forces/<br>distance to the wall |
| 2.1      | Resistance to fire        | <b>Version 0.1</b><br>Distance to combustible<br>materials with T200<br>and positive pressure P1                             | O(20) DN80-300 20mm,<br>O(30) DN301-450 30mm,<br>O(40) DN351-600 40mm,<br><br>ventilated, without shaft   | EN 1856-1  |
| 2.2      | Resistance to fire        | <b>Version 0.2</b><br>Distance to combustible<br>materials with T400<br>and negative pressure N1<br>and soot fire resistance | G(60) DN80-300 60mm,<br>G(90) DN301-450 90mm,<br>G(120) DN351-600 120mm,<br><br>ventilated, without shaft | EN 1856-1  |
| 2.3      | Resistance to fire        | <b>Version 0.3</b><br>Distance to combustible<br>materials with T400<br>and positive pressure H1                             | O(40) DN80-300 40mm,<br>O(60) DN301-450 60mm,<br>O(80) DN351-600 80mm,<br><br>ventilated, without shaft   | EN 1856-1  |
| 2.4      | Resistance to fire        | <b>Version 0.4</b><br>Distance to combustible<br>materials with T600<br>and positive pressure H1                             | O(50) DN80-300 50mm,<br>O(75) DN301-450 75mm,<br>O(100) DN351-600 100mm,<br><br>ventilated, without shaft | EN 1856-1  |
| 2.5      | Resistance to fire        | <b>Version 0.5</b><br>Distance to combustible<br>materials with T600<br>and positive pressure H1<br>and soot fire resistance | G(60) DN80-300 60mm,<br>G(90) DN301-450 90mm,<br>G(120) DN351-600 120mm,<br><br>ventilated, without shaft | EN 1856-1  |
| 3.1      | Gas tightness             | <b>Version 0.1</b><br>T200   | O(20) DN80-300 P1<br>O(30) DN301-450 P1<br>O(40) DN351-600 P1   | EN 1856-1  |
| 3.2      | Gas tightness             | <b>Version 0.2</b><br>T400   | G(60) DN80-300 N1<br>G(90) DN301-450 N1<br>G(120) DN351-600 N1  | EN 1856-1  |
| 3.3      | Gas tightness             | <b>Version 0.3</b><br>T400   | O(40) DN80-300 H1<br>O(60) DN301-450 H1<br>O(80) DN351-600 H1   | EN 1856-1  |
| 3.4      | Gas tightness             | <b>Version 0.4</b><br>T600   | O(50) DN80-300 H1<br>O(75) DN301-450 H1<br>O(100) DN351-600 H1  | EN 1856-1  |
| 3.5      | Gas tightness             | <b>Version 0.5</b><br>T600   | G(60) DN80-300 H1<br>G(90) DN301-450 H1<br>G(120) DN351-600 H1  | EN 1856-1  |
| 4.1      | Flow resistance           | <b>Version 0.1-0.5</b><br>Tubes  | sections of the chimney   | EN 1856-1<br>normative value                                 |

8 Declared performance

| lfd. Nr. | Essential characteristics    | Performance according EN 1856-1   | Values / Classes   | harmonised technical specification/other informations |
|----------|------------------------------|---|--|---|
| 4.2      | Flow resistance              | Version 0.1-0.5<br>Fittings   | Fittings of the chimney  | EN 1856-1<br>normative value                          |
| 4.3      | Flow resistance              | Version 0.1-0.5<br>Terminals  | Flow resistance  | EN 1856-1<br>Manufacturer                             |
| 5.1      | Thermal resistance           | Version 0.1-0.5   | 0,41 m <sup>2</sup> K/W bei 200°C<br>measured with 30 mm thickness   | EN 1856-1   |
| 6.1      | Thermal shock resistance     | Version 0.1<br>Sootfire resistance<br><br>Thermal performance under normal operating conditions | O(20) DN80-300 No<br>O(30) DN301-450 No<br>O(40) DN351-600 No<br>No-because O<br>O(20) DN80-300 T200<br>O(30) DN301-450 T200<br>O(40) DN351-600 T200   | EN 1856-1   |
| 6.2      | Thermal shock resistance     | Version 0.2<br>Sootfire resistance<br><br>Thermal performance under normal operating conditions | G(60) DN80-300 Ja<br>G(90) DN301-450 Ja<br>G(120) DN351-600 Ja<br><br>G(60) DN80-300 T400<br>G(90) DN301-450 T400<br>G(120) DN351-600 T400             | EN 1856-1   |
| 6.3      | Thermal shock resistance     | Version 0.3<br>Sootfire resistance<br><br>Thermal performance under normal operating conditions | O(40) DN80-300 No<br>O(60) DN301-450 No<br>O(80) DN351-600 No<br>No-because O<br>O(40) DN80-300 T400<br>O(60) DN301-450 T400<br>O(80) DN351-600 T400   | EN 1856-1   |
| 6.4      | Thermal shock resistance     | Version 0.4<br>Sootfire resistance<br><br>Thermal performance under normal operating conditions | O(50) DN80-300 No<br>O(75) DN301-450 No<br>O(100) DN351-600 No<br>No-because O<br>O(50) DN80-300 T600<br>O(75) DN301-450 T600<br>O(100) DN351-600 T600 | EN 1856-1   |
| 6.5      | Thermal shock resistance     | Version 0.5<br>Sootfire resistance<br><br>Thermal performance under normal operating conditions | G(60) DN80-300 Yes<br>G(90) DN301-450 Yes<br>G(120) DN351-600 Yes<br><br>G(60) DN80-300 T600<br>G(90) DN301-450 T600<br>G(120) DN351-600 T600          | EN 1856-1   |
| 7.1      | Flexural tensile strength    | Version 0.1-0.5   | NPD  | EN 1856-1   |
| 8.1      | Non vertical installation    | Version 0.1-0.5<br>Maximum offset between supports  | 90°  | EN 1856-1   |
| 8.2      | Non vertical installation    | Version 0.1-0.5<br>Maximum length between supports  | 3m   | EN 1856-1   |
| 9        | Components subject wind load | Version 0.1-0.5<br>Wind load  | free standing height above last support: 3 m<br>Maximum spacing between lateral supports: 3 m  | EN 1856-1   |
| 10.1     | Durability                   | Water and vapour diffusion resistance<br>Version 0.1/0.3/0.4<br>Version 0.2/0.5                 | W (Yes)<br>D (Yes)   | EN 1856-1   |

8 Declared performance

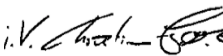
| Ifd. Nr. | Essential characteristics | Performance according EN 1856-1   | Values / Classes       | harmonised technical specification/other informations |
|----------|---------------------------|---|------------------------|---|
| 10.2     | Durability                | Condensate penetration resistance<br><b>Version 0.1/0.3/0.4</b><br><b>Version 0.2/0.5</b> | W (Yes)<br><br>D (Yes) | EN 1856-1   |
| 10.3     | Durability                | Corrosion resistance<br><b>Version 0.1/0.3/0.4</b><br><b>Version 0.2/0.5</b>              | V2<br><br>V3           | EN 1856-1   |

- 9 The performance of the product identified in points 1 and 2 is in conformity with the declared performance in point 8. This declaration of performance is issued under the sole responsibility of the manufacturer identified in point 4.

Signed for and on behalf of the manufacturer by:

Christian Freis, Technical director Raab-Group

Neuwied,  
26. February 2018

  
i.V. ....  
(Signature)