

## 15048001



Issued in accordance with the Construction Products Regulation (CPR) 305/2011/EU.  
 pgb-Europe nv hereby declares that the products mentioned below comply with the requirements of:

### EN 15048 Parts 1-2: Non-Preloaded Structural Bolting Assemblies

1. *Unique identification code of the product-type:*  
**15048**

2. *Type or serial number or any other element allowing identification of the construction product as required pursuant to Article 11(4):*



3. *Intended uses of the construction product, in accordance with the applicable harmonized technical specification as foreseen by the manufacturer:*

<b>Generic type:</b>	Non preloaded structural bolting. Bolt: ISO 4017 – 4014 Nut: ISO 4032
<b>Material:</b>	Bolt grade: Carbon steel / Alloy steel Grade 8.8 Nut grade: Carbon steel / Alloy steel Grade 8
<b>Corrosion protection:</b>	Zinc plating Cr3+, minimum 5 µm Hot Dip Galvanizing, min 45 µm
<b>Service class:</b>	Service class 1 and 2 according to EN 1995-1-1
<b>Intended use:</b>	Structural Bolting Assemblies

4. *Name, registered trade name or registered trade mark and contact address of the manufacturer as required pursuant to Article 11 (5):*

**pgb-Europe nv – Gontrode Heirweg 170 – 9090 Melle – Belgium**

5. *System or systems of assessment and verification of constancy of performance of the construction product as set out in Annex V:*

**System 2+**

6. *In case of the declaration of performance concerning a construction product covered by a harmonized*

**standard:** EN 15048-1 : 2007 (General requirement)  
 EN 15048-2 : 2007 (Suitability test)

**performed by:** TÜV Rheinland LGA Bautechnik GmbH  
 Tillystraße 2 – 90431 Nürnberg  
 NoBo n°: 0780

**under system:** 2+  
**and issued:** 0780-CPR-152097

# DECLARATION OF PERFORMANCE

DoP 15048001 (rev.01) page 2 / 2

7. In case of the declaration of performance concerning a construction product for which European Technical Assessment has been issued:

**NOT RELEVANT**

8. Declared performance:

Essential characteristics BOLT (ISO 4017 – 4014)		Performance		
		d ≤ M16 <sup>1</sup>	d > M16 <sup>2</sup>	Harmonised Technical Specification
Tensile strength R <sub>m</sub>	[MPa]	800	830	EN 15048-1:2007 (ISO 898-1:2013)
Stress at 0,2% non-proportional elongation, R <sub>p0,2</sub>	[MPa]	640	660	EN 15048-1:2007 (ISO 898-1:2013)
Stress under proof load S <sub>p</sub> <sup>1</sup>	[MPa]	580	600	EN 15048-1:2007 (ISO 898-1:2013)
Strength under wedge load		Pass with 6°		EN 15048-1:2007 (ISO 898-1:2013)
Rockwell hardness	[HRC]	22-32	23-34	EN 15048-1:2007 (ISO 898-1:2013)
Impact strength K <sub>v</sub> <sup>3</sup> (min)	[J]	27	27	EN 15048-1:2007 (ISO 898-1:2013)
Release of dangerous substances		Less than 0,2 ppm		EN 15048-1:2007

Essential characteristics NUT (ISO 4032)		Performance		
		d < M16	d ≥ M16	Harmonised Technical Specification
Stress under proof load S <sub>p</sub> <sup>1</sup>	[N/mm <sup>2</sup> ]	880	920	EN 15048-1:2007 (ISO 898-2:2012)
Vickers hardness	[HV]	200-302	233-353	EN 15048-1:2007 (ISO 898-2:2012)
Release of dangerous substances		Less than 0,2 ppm		EN 15048-1:2007

Essential characteristics WASHER (ISO ...)		Performance		
		d < M16	d ≥ M16	Harmonised Technical Specification
Vickers hardness	[HV]	200-302	233-353	EN 15048-1:2007 (ISO 6507-1:2005)
Release of dangerous substances		Less than 0,2 ppm		EN 15048-1:2007

Essential characteristics ASSEMBLIES Harmonised standard EN 15048-1:2007 (EN 15048)		Performance				
		M12	M16	M20	M22	M24
Tensile resistance of the assembly (min)	[kN]	70	130	203	252	293

9. The performance of the product identified in points 1 and 2 is in conformity with the declared performance. This declaration of performance is issued under the sole responsibility of pgb-Europe nv.

Place and date of issue	Signature
Melle, 18/08/2015	<div style="display: flex; align-items: center;"> <div style="border: 1px solid black; padding: 5px; margin-right: 20px;">                     nv pgb-Europe sa                      Gontrode Heirweg 170                      9090 MELLE                      BE 0425 888 396                 </div> <div>                     Johannes Heye, product manager   </div> </div>

<sup>1</sup> Values do not apply for structural bolting.

<sup>2</sup> For structural bolting d ≥ M12.

<sup>3</sup> Values are determined at a test temperature of -20°C, applies to d ≥ M16.