



**Handi As**  
**Mr. Magne Karlsen**  
**Magnus Barfots vei 5**  
**4633 KRISTIANSAND S**  
**Noorwegen**



**Your notice of**  
08-08-2017

**Your reference**

**Date**  
08-12-2017

## Analysis Report 17.04623.01

Required tests :

<b>EN 388-6.1 (2016)</b>	<b>Determination of the abrasion resistance on Martindale with emery paper</b>
<b>EN 388-6.3 (2016)</b>	<b>Determination of tearing resistance - gloves</b>
<b>EN 388-6.2 (2016)</b>	<b>Determination of the blade cut resistance</b>
<b>ISO 9151 (2016)</b>	<b>Convective heat</b>
<b>EN ISO 6942 (2002)</b>	<b>Radiant heat</b>
<b>EN 348 (1992)</b>	<b>Small splashes of molten metal.</b>
<b>EN 407-6.3 (2004)</b>	<b>Burning behaviour</b>
<b>EN 388-6.4 (2016)</b>	<b>Determination of the puncture resistance</b>
<b>EN 702 (1994)</b>	<b>Contact heat</b>
<b>EN 702 (1994)</b>	<b>contact heat</b>

Identification number	Information given by the client	Date of receipt
T1717357	Glove 2030/10	08-08-2017
T1717358	Glove 2014/10	08-08-2017
T1717359	Glove 1053/10	08-08-2017
T1717360	<b>Glove 1080/10</b>	08-08-2017
T1717361	Glove 1083/10	08-08-2017
T1717362	Glove 1153/10	08-08-2017
T1717363	Glove 2010/10	08-08-2017
T1717364	Glove 1043/10	08-08-2017
T1717365	Glove 1040/10	08-08-2017

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Christophe Cousyn

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✓

Handi As  
Mr. Magne Karlsen  
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4633 KRISTIANSAND S  
Noorwegen



Your notice of  
12-05-2017

Your reference

Date  
13-06-2017

## Analysis Report 17.02859.05

Required tests :

EN 420 6.1 (2003) + A1 (2009)

Determination of the dimensions of gloves

EN 388-6.3 (2016)

Determination of tearing resistance - gloves

EN 388-6.1 (2016)

Determination of the abrasion resistance on Martindale with emery paper

EN 388-6.2 (2016)

Determination of the blade cut resistance

Identification number	Information given by the client	Date of receipt
T1710358	Glove 1080	12-05-2017

Christophe Cousyn

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**Reference: T1710358 - Glove 1080**

**Determination of the dimensions of gloves**

Date of ending the test 29-05-2017  
Standard used EN 420 6.1 (2003) + A1 (2009)  
Product standard EN 420 (2003) + A1 (2009)  
Deviation from the standard The circumference is measured on the outside of the glove  
Number of gloves 2 x 2

	Size		Total length (mm)	Length of the top of the middle finger until the wrist (mm)	Circumference (mm)
#1	10	left	255	195	245
#2	10	right	250	200	245
#3	10	left	260	205	260
#4	10	right	255	205	265

Performed in the physical lab Ghent under the responsibility of Filip Ghekiere



**Reference: T1710358 - Glove 1080**

**Determination of tearing resistance - gloves**

Date of ending the test	06-06-2017
Standard used	EN 388-6.3 (2016)
Product standard	EN 388 (2016)
Deviation from the standard	-
Conditioning	23°C, relative humidity 50%
Apparatus	Instron, type CRE, class 0,5
Cell	100 N
Rate	100 mm/min
Number of test specimens	2 (Length direction) 2 (Width direction)
Calculation	Automatic - the highest peak

One layer material

	Tear resistance (N)
Length	> 75.0
Length	> 75.0
Width	33.6*
Width	> 75.0
Minimum	33.6 N

Remark \* = Tear transfer

Classification level				
Level 1	Level 2	Level 3	Level 4	Level 5
10 N	25 N	50 N	75 N	-

Performed under accreditation in the physical lab Ghent under the responsibility of Filip Ghekiere





**Reference: T1710358 - Glove 1080**

**Determination of the abrasion resistance on Martindale with emery paper**

Date of ending the test 08-06-2017  
Standard used EN 388-6.1 (2016)  
Product standard EN 388 (2016)  
Deviation from the standard -  
Conditioning 23°C, relative humidity 50%  
Apparatus Martindale Wear and Abrasion Tester  
Used pressure 9 kPa  
Abradant Klingspor PL31B Gritt 180  
Number of test specimens 4  
Specimens tested by 4

One layer material

	Number of cycles to breakdown the specimen
#1	500 >< 2000
#2	2000 >< 8000
#3	2000 >< 8000
#4	> 8000
Minimum	500 >< 2000

Classification level				
Level 1	Level 2	Level 3	Level 4	Level 5
100 cycli	500 cycli	2000 cycli	8000 cycli	-

Performed under accreditation in the physical lab Ghent under the responsibility of Filip Ghekiere



**Reference: T1710358 - Glove 1080**

**Determination of the blade cut resistance**

Date of ending the test 06-06-2017  
 Standard used EN 388-6.2 (2016)  
 Product standard EN 388 (2016)  
 Deviation from the standard -  
 Conditioning 23°C, relative humidity 50%  
 Apparatus Coupetest  
 Number of test specimens 2

One layer material

Direction /

	Ref. fabric	Test specimen 1	Ref. fabric	Index
#1	1.1	0.4	1.2	1.35
#2	1.2	0.4	1.3	1.32
#3	1.3	0.5	1.4	1.37
#4	1.4	0.5	1.5	1.34
#5	1.5	0.6	1.5	1.40
Average	1.3	0.5	1.4	1.4

Direction \

	Ref. fabric	Test specimen 2	Ref. fabric	Index
#1	1.2	0.4	1.2	1.33
#2	1.2	0.5	1.3	1.40
#3	1.3	0.4	1.4	1.30
#4	1.4	0.5	1.3	1.37
#5	1.3	0.5	1.5	1.36
Average	1.3	0.5	1.3	1.4

Classification level				
Level 1	Level 2	Level 3	Level 4	Level 5
1.2	2.5	5.0	10.0	20.0



**Reference: T1717360 - Glove 1080/10**

**Determination of the puncture resistance**

Date of ending the test 06-09-2017  
Standard used EN 388-6.4 (2016)  
Product standard EN 388 (2016)  
Deviation from the standard -  
Conditioning 23°C, relative humidity 50%  
Apparatus Instron, type CRE, class 0,5  
Cell 1 kN  
Perforation speed 100 mm/min  
Used spike Test spike of steel with rounded top  
Maximum displacement 50 mm  
Number of test specimens 4

One layer material

Specimen	Force (N)
#1	118
#2	66.8
#3	99.9
#4	95.4
Minimum	66.8 N

Classification level				
Level 1	Level 2	Level 3	Level 4	Level 5
20 N	60 N	100 N	150 N	-

Performed under accreditation in the physical lab Ghent under the responsibility of Filip Ghekiere



**Reference: T1717360 - Glove 1080/10**

**Determination of the puncture resistance**

Date of ending the test 06-09-2017  
Standard used EN 388-6.4 (2016)  
Product standard EN 388 (2016)  
Deviation from the standard -  
Conditioning 23°C, relative humidity 50%  
Apparatus Instron, type CRE, class 0,5  
Cell 1 kN  
Perforation speed 100 mm/min  
Used spike Test spike of steel with rounded top  
Maximum displacement 50 mm  
Number of test specimens 4

One layer material

Specimen	Force (N)
#1	118
#2	66.8
#3	99.9
#4	95.4
Minimum	66.8 N

Classification level				
Level 1	Level 2	Level 3	Level 4	Level 5
20 N	60 N	100 N	150 N	-

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