1 4
1.1 4
1.2 4
1.3 4
1.4 5
1.5 5
1.6 5
2 6
2.1 6
2.2 6
2.3 6
2.4 7
2.4.1 7
3 8
3.1 8
3.2 9
3.2.1 10
3.2.2 11
3.2.3 12
3.2.4 12
3.2.5 13
3.3 14
3.3.1 15
3.5 15
3.6 16
3.7 17
3.8 17

3.9 18
3.10 18
3.11 19
4 21
4.1 21
4.2 21
4.3 21
5 22
5.1 22
5.2 22
6 24
7 25
8 27

1

1.4

1)

3.5% Halon1301 4.3%

6.3% A B C

2)

0DP 0

ALT 5 GWP 1

3)

4

4.5~6% NOAEL 10%

1.5

A B E

1)

2)

3)

1.6

1)

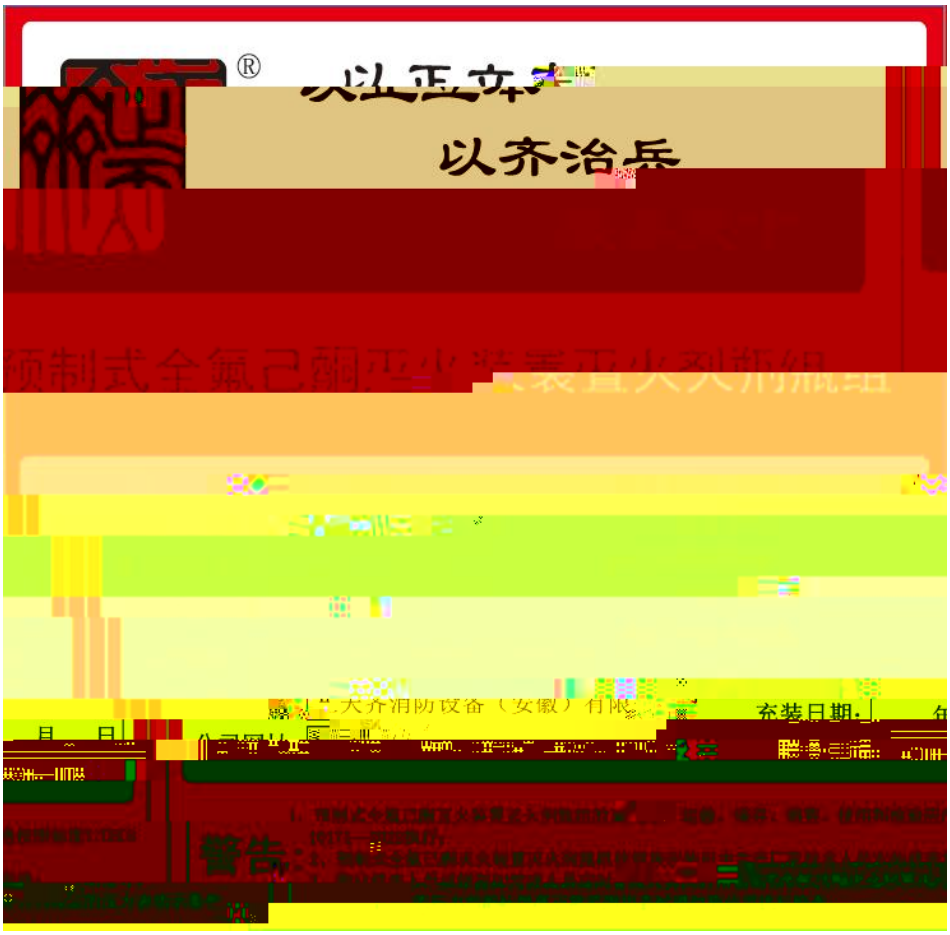
2)

2.4

D

① ⑤
② ⑥
③ ⑦
④ ⑧

3.2.3

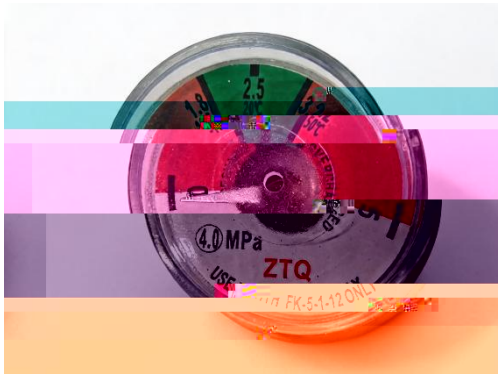


7

6

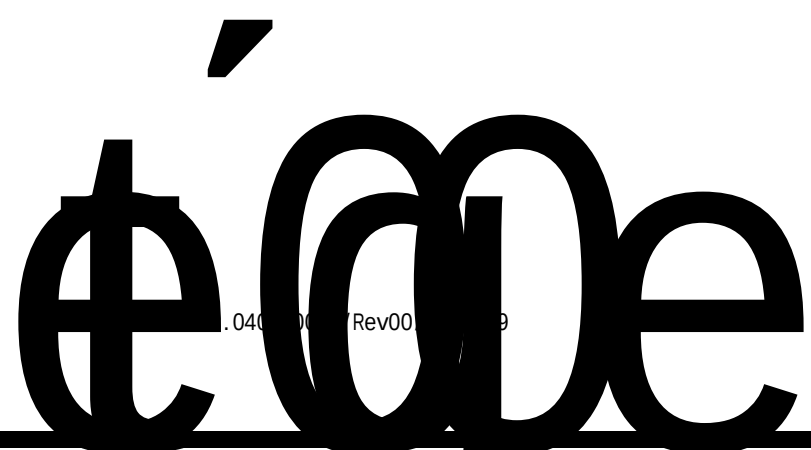
		/mm		
Z0.0401.0235	40L 50L 70L	260×255		

3.2.4



8

7



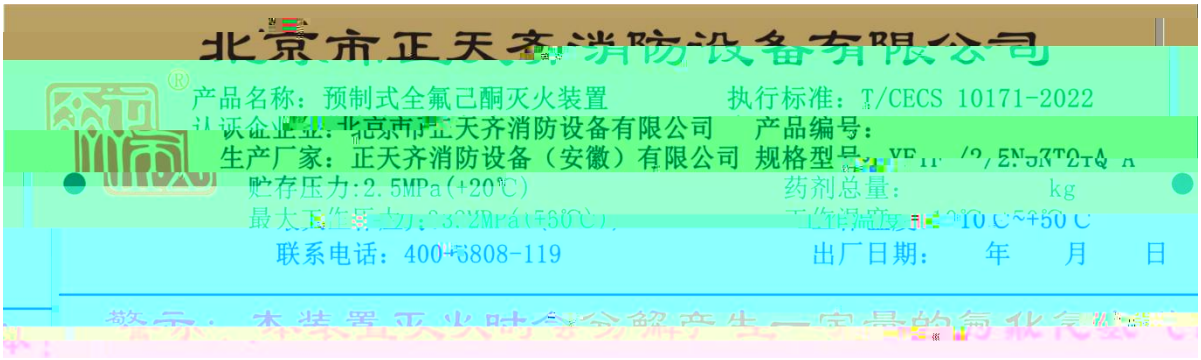


12

11

		/MPa	/MPa	/	/kg
Z0.0301.0854	XF0.6/17.2-ZTQ-A	0.6	.	ȳ	

		/MPa		/			L/mm	
Z0.0301.0810	RG32/4.2-ZTQ_L650_M44x2_NPT1-1/4	4.2	DN32	0-50	M44×2	NPT1-1/4	650	/



15

15

		/mm	
Z0.0401.0236	YF/2.5N-ZTQ-A	280 × 75	

3.8



16

16

				/mm		
40L 50L	Z0.0301.0116	LG250	Φ10	250	M10×1.5	
70L	Z0.0301.0118	LG310		310		

3.9



17

17

4

4.1

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-
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-
-
- /
-

4.2

- IG-100

-
- 90%
-
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-
- GB 50263 1

5

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6

1.

20

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3.

4.

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Z0