

# Powder Free Nitrile Examination Gloves

KG-1802

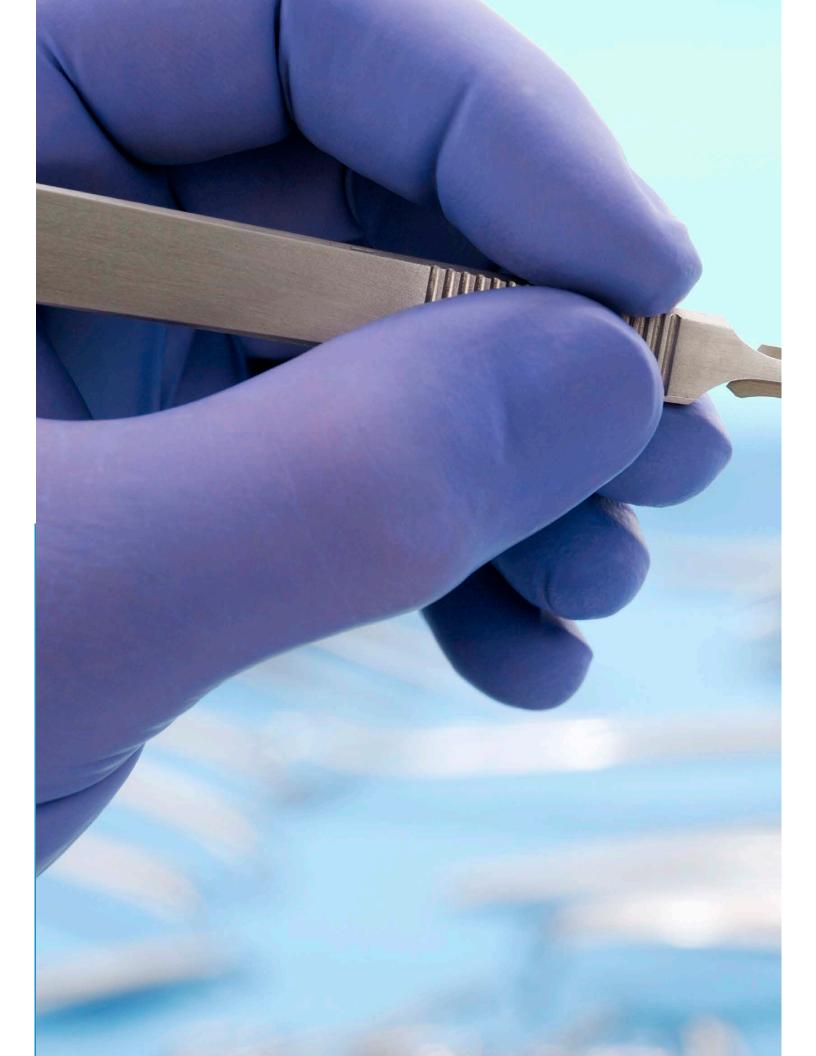




# You're protected.

Our gloves are manufactured by overcoming numerous tests based on the corresponding regulations.

KINGFA has a daily production capacity of 1,000,000 units per line. At the end of 2021, KINGFA will have 96 functional production lines, reaching a total daily production capacity of over 100,000,000 units.





### **ABOUT KINGFA**

KINGFA Group is established in 1993 and listed on the Shanghai Stock Exchange in 2004, is the world's leading high-tech manufacturing company committed to R&D, production and marketing of advanced polymer materials. KINGFA Group has been exported products to more than 130 countries, which is providing high-quality services to more than 1000 customers worldwide.



Founded **1993** 



Employees **10000+** 



Manufacturing Bases **16+** 



Invention Patents **3000+** 



Countries served **130+** 



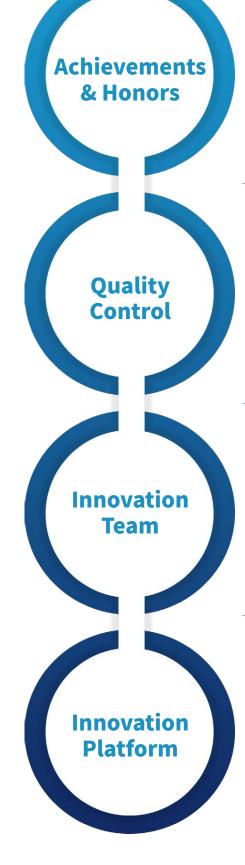
Revenue of 2020 **5,400,000,000** 

KINGFA MEDICAL, establishing itself as an important industrial segment of KINGFA, focuses on the R&D, production and sales of medical and healthcare products. Utilizing KINGFA's technological innovations within the advanced polymer industry for more than 28 years, KINGFA MEDICAL established a vertically integrated supply chain. From the upstream production of polypropylene polymer to the downstream production of face masks, protective coveralls, surgical gowns and other similar products. Furthermore, KINGFA MEDICAL has developed the Nitrile Glove Project with a daily production capacity of 1,000,000 units per line. At the end of 2021, KINGFA will have 96 functional production lines, reaching a total daily production capacity of over 100,000,000 units.

KINGFA MEDICAL is committed to supply high-performance medical and healthcare protective devices to communities around the world.







- 3 National Science and Technology Awards
- 15 China Patent Awards
- 93 Drafting and revision of national and industrial standards

- ISO/IEC 17025 State Accredited Laboratory
- ISO 9001 Quality Management System Certification
- ISO 13485 Medical Device Quality Management System
- QSR820 FDA Quality System Regulation
- ISO 14001 Environmental Management System
- 5 State Council Special Allowance Experts
- 15 R&D Leading Academicians
- 108 Senior Experts
- 112 Senior Professional Titles
- 125 Doctors
- 651 Masters
- UL-CTDP Accredited Laboratory
- State Key Laboratory
- National Enterprise Technology Center
- Post-doctoral Research Center
- Academician Workstation



# Focus on supplier management, new products development and quality control.

Production Lines



Strong Supply System



R&D Center



Excellent Technology Team





# **MODEL:KG-1802**

PRODUCT INFOR	PRODUCT INFORMATION							
Material	100% Nitrile							
Color	Blue Violet							
Cuff length	Standard							
Glove length(mm/inches) min	240 / 9.5							
Powder content	Powder-Free							
External glove surface	Textured Finger							
Freedom from holes(Inspection level I)	1.5 AQL							
Palm thickness (mm/mil)	≥ 0.07 / 2.7							
Finger thickness (mm/mil)	≥ 0.1 / 4.0							
Tensile strength	≥ 14 Mpa							
Elongation	≥ 500%							
Application Temperature	≤ 40°C							
Shelf Life	3 Years							

Size	Median Length(mm)	Median Width(mm)
S	≥ 240	80±10
М	≥ 240	95±10
L	≥ 240	110±10
XL	≥ 240	≥ 110

# **INTENDED USE**

The patient examination glove is a disposable device intended for medical purposes that is worn on the examiner's hand to prevent contamination between patient and examiner.

# **FEATURES**

- Powder free/Latex free
- Superior strength with better puncture resistance
- Excellent chemical resistance
- High chemotherapy drug resistance
- Excellent antiviral properties
- Skin irritation&sensitization tested



These gloves were tested for use with chemotherapy drugs per ASTM D6978-05 (2019)Standard Practice for Assessment of Medical Gloves to Permeation by Chemotherapy Drugs. Tested chemotherapy drugs are as follows:	Minimum Breakthrough Detection Time(minutes)
Carmustine (BCNU) 3.3 mg/ml	65.3 minutes
Cisplatin 1.0 mg/ml	>240 minutes
Cyclophosphamide (Cytoxan) 20.0 mg/ml	>240 minutes
Dacarbazine (DTIC)10.0 mg/ml	>240 minutes
Doxorubicin Hydrochloride 2.0 mg/ml	>240 minutes
Etoposide (Toposar) 20.0 mg/ml	>240 minutes
Fluorouracil 50.0 mg/ml	>240 minutes
Paclitaxel (Taxol) 6.0 mg/ml	>240 minutes
Thiotepa 10.0 mg/ml	58.3minutes

# STANDARDS AND CERTIFICATIONS

EN374 TYPE B
ASTM D6319(FDA 510K)
ASTM D6978

# **REGULATORY COMPLIANCE**

21 U.S.C. ch.9 EU 2016/425 MDD 93/42/EEC EC 10/2011 REACH EC 1935/2004

# MANUFACTURING ACCREDITATIONS

ISO/IEC 17025 State Accredited Laboratory
ISO 9001 Quality Management System Certification
ISO 13485 Medical Device Quality Management System
QSR820 FDA Quality System Requirements
ISO 14001 Environmental Management System





# Package Components KG-1802

# **Exterior Package Design**

- Size:225\*120\*63 mm





## **Carton Package Design**

- 10 boxes/carton
- Size:330\*250\*240 mm





# **Container Loading**

(For Reference Only)

20GP	1500 cartons
40GP	3100 cartons
40HQ	3464 cartons

## **STORAGE INSTRUCTIONS**







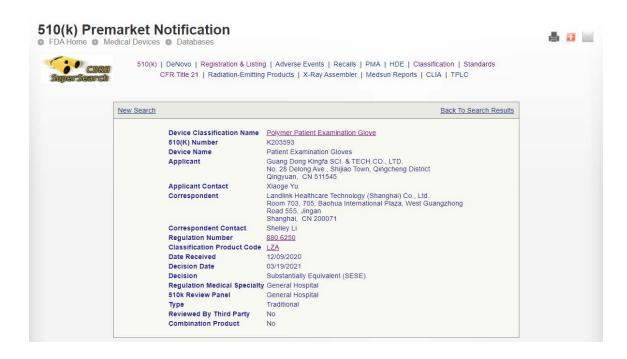






### **TEST REPORT**

## FDA 510K







### TEST REPORT

### **ASTM D6319**



GUANGDONG KINGFA SCI.&TECH.CO.,LTD. Applicant:

NO.28 DELONG AVENUE, SHIJIAO TOWN, QINGCHENG DISTRICT, QINGYUAN CITY,

GUANGDONG PROVINCE, CHINA

XIAOGE YU Attn:

Sample Description:

Three Hundred (300) pieces of submitted samples said to be Nitrile examination gloves in Blue

ASTM D6319-19 Standard Ref. No. KG-1802 P.O. No. 25007025

Colors Blue

KG-1802 S/M/L/XL Size Range

Nitrile Palm Back Nitrile Cuff Nitrile **Cuff Binding** Nitrile Nitrile Lining

Date Received/Date Test Started: Nov. 16, 2020/--Date Final Information Confirmed/ Nov. 27, 2020/--

Date Payment Received:

Test Result Please Refer To Attached Page(S).

Should you have any query on this report, you may contact at <a href="mailto:qzfootwear@intertek.com">qzfootwear@intertek.com</a>

Authorized By:

For Intertek Testing Services Shenzhen Ltd.

Guangzhou Branch

**Guiliang Dong** Senior Lab Manager

wx / lynnyang

Intertek Testing Services Shenzhen Ed. Quangzhou Branch 深圳天祥质量技术服务体操公司实现公司

0 83966868 Fax: +86 20 82228169 Postcode: 510730

Room 02, 1-8/F. & Room 01, E101/E201/E301/E401/E501/E601/E701/E801 No.7-2, Caipin Road, Guangzhou Science City, GETDD, Guangzhou, Guangdorg, China echnological Development District, Guangzhou, 广州经济技术开发区科学城彩频路7号之二第1-8层02房、01房101、

E201、E301、E401、E501、E601、E701、E801 Tel: +86 208213 9001 Fax: +86 20 82089909 Postcode: 510663

中国认可 国际互认 检测

TESTING **CNAS L0220** 

GZHT91004600

Nov 28, 2020

Number:

Date:









GZHT91004600

中国认可 国际互认 检测 TESTING **CNAS L0220** 

Total Quality. Assured. TEST REPORT

Tests Conducted (As Requested By The Applicant)

Freedom From Holes (ASTM D6319-19, 7.3 & ASTM D5151-19)

Results		Requi	Pass/Fail			
Physical Performance	Failure	AQL	Physical Performance	AQL	n [Ac Re]	-
Water Leakage	2	< 2.5	No Leakage	2.5	200 (10 11)	Pass

n Means Sample Size, Ac Means Acceptance Number, Re Means Rejection Number. Remark:

/ lynnyang

Page 2 Of 10

Intertek Testing Services Shenzher ttg. Quangzhou Branch 深圳天祥质量技术服务企业公司

Room 02, 1-8/F. & Room 01, E101/E201/E301/E401/E501/E501/E501/E701/E8013 3/F., Tiengrun Building, 235 Kaifa Ave., Guangzhou No.7-2, Caipin Road, Guangzhou Science City, GETDD, Guangzhou, Guangdou, Guangdou, Guangzhou, Guangzhou Science City, GETDD, Guangzhou, Guangdou, Guangzhou, Guan E201, E301, E401, E501, E601, E701, E801 Tel: +86 208213 9001 Fax: +86 20 82089909 Postcode: 510663

echnological Development District, Guangzhou, 验检测 181-88 20 83966868 Fax: +86 20 82228169 Postcode: 510730









Number:

GZHT91004600

Tests Conducted (As Requested By The Applicant)

2 Physical Dimensions (ASTM D6319-19, 7.4 & ASTM D3767-03 (2020))

Results			Requirement			Pass/Fail
Physical Performance	Failure	AQL	Physical Performance	AQL	n [Ac Re]	-
See Test Data	0	< 4.0	Size: S Width: (80 ± 10) mm Length: Min. 220 mm Finger Thickness: Min. 0.05 mm Palm Thickness: Min. 0.05 mm	4.0	13 (1 2)	Pass

### Test Data:

Size	Specimen	Width (mm)	Length (mm)	Finger Thickness (mm)	Palm Thickness (mm)
	1	85	242	0.14	0.11
S	2	83	237	0.15	0.12
	3	84	239	0.15	0.12
	4	84	235	0.15	0.12
	5	84	241	0.14	0.12
	6	86	243	0.14	0.11
	7	86	245	0.13	0.11
	8	86	235	0.14	0.11
	9	83	239	0.15	0.11
	10	85	230	0.15	0.10
Ī	11	85	243	0.16	0.10
	12	87	241	0.15	0.10
	13	86	240	0.14	0.11

/ lynnyang

Page 3 Of 10

20 83966868 Fax: +86 20 82228169 Postcode: 510730

Room 02, 1-8/F. & Room 01, E101/E201/E301/E401/E501/E601/E701/E801 hina Economic & China Tel: 486 20 No.7-2, Capin Road, Guangzhou Science City, GETDD, Guangzhou, Guang 广州经济技术开发区科学城彩频路 7 号之二第 1 - 8 层 02 房、01 房 101、 E201、E301、E401、E501、E601、E701、E801 echnological Development District, Guangzhou, 齐技开发区开发大道 235 号恒运大厦 3 楼









Number:

GZHT91004600

Tests Conducted (As Requested By The Applicant)

Physical Dimensions (ASTM D6319-19, 7.4 & ASTM D3767-03 (2020)) (Cont)

Results			Requirement			Pass/Fail
Physical Performance	Failure	AQL	Physical Performance	AQL	n [Ac Re]	-
See Test Data	0	< 4.0	Size: M Width: $(95 \pm 10)$ mm Length: Min. 230 mm Finger Thickness: Min. 0.05 mm Palm Thickness: Min. 0.05 mm	4.0	13 (1 2)	Pass

Size	Specimen	Width	Length	Finger Thickness	Palm Thickness
	(8)	(mm)	(mm)	(mm)	(mm)
	1	97	245	0.16	0.12
M	2	97	233	0.15	0.11
	3	96	237	0.15	0.11
	4	96	239	0.14	0.11
	5	95	242	0.15	0.12
	6	95	243	0.15	0.11
	7	95	238	0.14	0.12
	8	96	239	0.14	0.11
	9	96	242	0.13	0.10
	10	93	241	0.14	0.11
	11	94	236	0.15	0.12
	12	96	242	0.14	0.11
	13	97	240	0.14	0.12

/ lynnyang

Page 4 Of 10

Room 02, 1-8/F. & Room 01, E101/E201/E301/E401/E501/E601/E701/E801 No.7-2, Caipin Road, Guangzhou Science City, GETDD, Guangzhou, Guangdorg, Chir 广州经济技术开发区科学城彩频路 7 号之二第 1—8 层 02 房、01 房 101、 E201、E301、E401、E501、E601、E701、E801









TEST REPORT Tests Conducted (As Requested By The Applicant)

Physical Dimensions (ASTM D6319-19, 7.4 & ASTM D3767-03 (2020)) (Cont)

Results			Requirement			Pass/Fail	
Physical Performance	Failure	AQL	Physical Performance	AQL	n [Ac Re]	-	
See Test Data	0	< 4.0	Size: L Width: (110 ± 10) mm Length: Min. 230 mm Finger Thickness: Min. 0.05 mm Palm Thickness: Min. 0.05 mm	4.0	13 (1 2)	Pass	

Size	Specimen	Width	Length	Finger Thickness	Palm Thickness
		(mm)	(mm)	(mm)	(mm)
	1	106	245	0.17	0.11
	2	103	247	0.17	0.11
L	3	103	242	0.18	0.11
	4	104	246	0.18	0.12
	5	107	244	0.17	0.12
	6	105	246	0.16	0.10
	7	105	247	0.16	0.11
	8	106	240	0.17	0.12
	9	106	237	0.17	0.12
	10	104	240	0.18	0.12
	11	106	239	0.17	0.13
	12	107	241	0.17	0.11
	13	105	242	0.16	0.11

/ lynnyang

Page 5 Of 10

20 83966868 Fax: +86 20 82228169 Postcode: 510730

Intertek Testing Services Shenzhen Etd Guidigzbou Branch 深圳天祥质量技术服务企設公司经验公司 /E301/E401/E501/E601/E701/E8012 Room 02, 1-8/F. & Room 01, E101/E201/E301/E401/E501/E601/E701/E801 hina Economic & China Tel: 486 20 No.7-2, Capin Road, Guangzhou Science City, GETDD, Guangzhou, Guangdorg, 广州经济技术开发区科学城彩频略 7 号之二第 1 — 8 层 02 房、01 房 101、 E201、E301、E401、E501、E601、E701、E801 echnological Development District, Guangzhou, 齐技开发区开发大道 235 号恒运大厦 3 楼









Number:

GZHT91004600

Tests Conducted (As Requested By The Applicant)

Physical Dimensions (ASTM D6319-19, 7.4 & ASTM D3767-03 (2020)) (Cont)

Re	esults		Requirement			Pass/Fail
Physical Performance	Failure	AQL	Physical Performance	AQL	n [Ac Re]	-
See Test Data	0	< 4.0	Size: XL Width: (120 ± 10) mm Length: Min. 230 mm Finger Thickness: Min. 0.05 mm Palm Thickness: Min. 0.05 mm			Pass

### Test Data:

Size	Specimen	Width	Length	Finger Thickness	Palm Thickness
		(mm)	(mm)	(mm)	(mm)
	1	117	245	0.17	0.11
	2	116	243	0.16	0.11
XL	3	116	246	0.16	0.10
	4	115	246	0.16	0.11
	5	116	242	0.17	0.12
	6	115	247	0.16	0.11
	7	115	240	0.16	0.10
	8	113	243	0.16	0.09
	9	113	242	0.17	0.09
	10	114	240	0.17	0.11
	11	116	244	0.17	0.10
	12	117	244	0.18	0.12
	13	117	246	0.18	0.11

Remark: n Means Sample Size, Ac Means Acceptance Number, Re Means Rejection Number.

/ lynnyang

Page 6 Of 10

Intertek Testing Services Shenzhen Ltd. Guangzhou Branch 深圳天祥质量技术服务企设公司产业公司 [F301/E401/E501/E601/E701/E8012] 3/F., 距离如此 Building,

深则不怦映里这个 Room 02, 1-8/F. & Room 01, E101/E201/E301/E401/E501/E601/E701/E801 No.7-2, Caipin Road, Guangzhou Science City, GETDD, Guangzhou, Guandon 95 广州经济技术开发区科学城彩频略 7 号之二第 1—8 层 02 房、01 房 101、 E201、E301、E401、E501、E601、E701、E801

Tel: +86 208213 9001 Fax: +86 20 82089909 Postcode: 510663

5/7-7, England Building, 255 Kalla Ave., Guarigzhoù hina Conguig & Echnological Development District, Guarigzhou, China 大学 大井 大阪区开发大道 235 号恒运大厦 3 楼 181-286 68 83966868 Fax: +86 20 82228169 Postcode: 510730

Building, 235 Kaifa Ave., Guangzhou









Number:

GZHT91004600

**TEST REPORT** Tests Conducted (As Requested By The Applicant)

Physical Requirements Before Aging (ASTM D6319-19, 7.5 & ASTM D412-16)

Results			<u>Requirement</u>			Pass/Fail
Physical Performance	Failure	AQL	Physical Performance	AQL	n [Ac Re]	-
See Test Data	1	< 4.0	Tensile Strength Min. 14 Mpa Ultimate Elongation Min. 500 %	4.0	13 (1 2)	Pass

### Toct Data

	ĺ (	Re	sults
Condition	Sample	Tensile Strength (MPa)	Ultimate Elongation (%)
Before Aging	1	23.6	480
	2	32.4	540
	3	41.3	540
	4	38.1	532
	5	42.2	552
	6	40.4	548
	7	31.2	520
	8	28.6	532
	9	34.1	500
	10	44.8	500
	11	29.5	500
	12	37.4	520
	13	37.8	500

n Means Sample Size, Ac Means Acceptance Number, Re Means Rejection Number. Remark:

/ lynnyang

Page 7 Of 10

Intertek Testing Services Shenzhen Etd Guidigzbou Branch 深圳天祥质量技术服务企設公司经验公司 /E301/E401/E501/E601/E701/E8012 Room 02, 1-8/F. & Room 01, E101/E201/E301/E401/E501/E601/E701/E801 hina Economic & China Tel: 486 20 No.7-2, Caipin Road, Guangzhou Science City, GETDD, Guangchou, Guandcing, T 广州经济技术开发区科学城彩频路 7 号之二第 1 —8 层 02 房、01 房 101、 E201、E301、E401、E501、E601、E701、E801 echnological Development District, Guangzhou, 齐技开发区开发大道 235 号恒运大厦 3 楼







Number: GZHT91004600

4 Physical Requirements After Accelerated Aging (ASTM D6319-19, 7.5 & ASTM D412-16 & ASTM D573-04 (2019))

Results			Requirement			Pass/Fail
Physical Performance	Failure	AQL	Physical Performance	AQL	n [Ac Re]	-
See Test Data	0	< 4.0	Tensile Strength Min. 14 MPa Ultimate Elongation Min. 400 %	4.0	13 (1 2)	Pass

### Test Data:

		Re	sults
Condition	Sample	Tensile Strength (MPa)	Ultimate Elongation (%)
After Accelerated	1	40.1	540
Aging	2	47.1	520
(70 °C For 166 h)	3	17.6	440
	4	40.3	500
	5	44.3	520
	6	38.4	552
	7	42.6	508
	8	42.1	532
	9	38.1	500
	10	43.2	500
	11	37.0	500
	12	44.1	520
	13	36.7	500

Remark: n Means Sample Size, Ac Means Acceptance Number, Re Means Rejection Number.

/ lynnyang

Page 8 Of 10

Intertek Testing Services Shenzhen Ltd. Guangzhou Branch 深圳天祥质量技术服务企模公司产业公人司/E301/E401/E501/E601/E701/E8012

深圳八年映 単12 小//~/ Room 02, 1-8/F. & Room 01, E101/E201/E301/E401/E501/E601/E701/E801/E No.7-2, Caipin Road, Guangzhou Science City, GETDD, Guangzhou, Guangdorg, T 片始終技术开发区科学域彩頻略 7 号之二第1 一8 层 02 房、01 房 101、 E201、E301、E401、E501、E601、E701、E801

Tel: +86 208213 9001 Fax: +86 20 82089909 Postcode: 510663

1977 - Del agui Bullullig, 255 Kalla Ave., Guarigzilou China Conomic 8 Technological Development District, Guargzhou, China 建設を開催している。 1897年 - 大学 大大道 235 号恒运大厦 3 楼 1897年 - 1897年 -

Building, 235 Kaifa Ave., Guangzhou









**TEST REPORT** Tests Conducted (As Requested By The Applicant)

Powder Residue For Powder Free Gloves (ASTM D6319-19, 7.6 & ASTM D6124-06 (2017))

Size	Result	Requirement	Pass/Fail
XL	0.2 mg	Max. 2.0 mg	Pass

Package Marking (ASTM D6319-19, 9.3)

	Requirements	Pass	Fail	N/A
9.3.1	Sterile Packages Shall Bear Markings For The Contents To Include The Glove			
	Size, Instructions For Opening, The Legend "Sterile," And A Manufacturing			X
	Lot Number.			
9.3.2	Nonsterile And Bulk Packages Shall Bear Markings For The Contents To	x		
	Include The Glove Size And A Manufacturing Lot Number.	^		
9.3.3	The Outermost Case Shall Be Labeled With The Glove Size And A			
	Manufacturing Lot Number. Sterile Product Cases Shall Also Be Marked With	X		
	The Legend "Sterile."		X.	
9.3.4	All Levels Of Packaging Shall Conform To All Appropriate Government	x		
	Labeling Regulations.	^		

The Submitted Sample MEETS The Requirements Of ASTM D6319-19 Clause 9.3 For Compliance:

Package Marking.

/ lynnyang

Page 9 Of 10

83966868 Fax: +86 20 82228169 Postcode: 510730

Intertek Testing Services Shenghen Ed. Quengzhou Branch 深圳天祥质量技术服务(缺公司代现公司)。

[E301/E401/E501/E601/E701/E8019 3/F. Telengyun Building, 235 Kaifa Ave., Guangzhou e City, GETDD, Guangzhou, Guangdoi ga, China Economia & Technological Development District, Guangzhou e City, GETDD, Guangzhou, Guangzhou e City, GETDD, Guangzhou, Guangzhou e City, GETDD, Guangzhou e City, GETDD, Guangzhou belle significant for the Company of the Room 02, 1-8/F. & Room 01, E101/E201/E301/E401/E501/E601/E701/E801 No.7-2, Caipin Road, Guangzhou Science City, GETDD, Guangzhou, Guang 广州经济技术开发区科学城彩频路7号之二第1-8层02房、01房101、 E201、E301、E401、E501、E601、E701、E801 echnological Development District, Guangzhou,









This report is made solely on the basis of your instructions and/or information and materials supplied by you. It is not intended to be a recommendation for any particular course of action. Intertek does not accept a duty of care or any other responsibility to any person other than the Client in respect of this report and only accepts liability to the Client insofar as is expressly contained in the terms and conditions governing Intertek's provision of services to you. Intertek makes no warranties or representations either express or implied with respect to this report save as provided for in those terms and conditions. We have aimed to conduct the Review on a diligent and careful basis and we do not accept any liability to you for any loss arising out of or in connection with this report, in contract, tort, by statute or otherwise, except in the event of our gross negligence or wilful misconduct. No copy of the test report(except for full text copy) shall be made without the written approval by Intertek.

Page 10 Of 10



## **TEST REPORT**

**ASTM D6978** 



Testing. Development. Problem Solving.

March 10, 2021

### \*TEST REPORT\*

PN 157940

### PHARMACEUTICAL SERVICES

Prepared For:

Yu Xiaoge
Guangdong Kingfa Sci. & Tech. Co., Ltd.
No. 28, Delong Avenue, Shijiao Town, Qingcheng District,
Qingyuan City, Guangdong Province
Qingyuan City, 511500
China

Prepared By:

Tiffany Heller Manager, Pharmaceutical Services Approved By:

Ana C Barbur, M.S.

Vice President, Analytical & Chemical Services

Rev 101218



An A2LA ISO 17025 Accredited Testing Laboratory — Certificate Numbers 255.01 & 255.02 ISO 9001:2015 Registered

ISO 9001:2015

Registered

Letters and reports are for the exclusive use of the clients to whom they are addressed and shall not be reproduced, except in full, without the written permission of Airon Rubber Development Laboratory, Inc. (ARDL). The information contained herein applies to the specific material, products or processes tested or evaluated. No warranty of any kind is herein construed or implied. The faability of ARDL, inc. shall be initiated to the amount of consideration paid for services. ARDL, inc. is 150 TOS2 accredited by ASDL not test we melood studied on the referenced certificates.

www.ardl.com | 2887 Gilchrist Rd. | Akron, Ohio 44305 | answers@ardl.com | Toll Free (800) 830-ARDL Fax (330) 794-6610 | Worldwide (330) 794-6600





Testing. Development. Problem Solving.

March 10, 2021

Yu Xiaoge Guangdong Kingfa Sci. & Tech. Co., Ltd. Page 2 of 5 PN 157940

SUBJECT: Permeation testing per ASTM D6978-05(2019) on sample submitted by the above company.

RECEIVED: One (1) glove type identified as; Nitrile Gloves, Style/Item No.: KG-1802, P.O./Ref No. 25007030.

### TEST CHEMICALS:

Table 1. List of the Testing Drugs and their Sources

TESTING CHEMOTHERAPY DRUGS	DRUG SOURCE
Carmustine (BCNU), 3.3 mg/ml (3,300 ppm)	Sigma Aldrich; Batch# 0000098912; Expiration 02/2022
Cisplatin, 1.0 mg/ml (1,000 ppm)	Accord; Lot# P2001296; Expiration 01/2022
Cyclophosphamide (Cytoxan), 20.0 mg/ml (20,000 ppm)	Accord; Lot# 19112225; Expiration 10/2021
Dacarbazine, 10.0 mg/ml (10,000 ppm)	Teva; Lot# 31325414B; Expiration 09/2021
Doxorubicin HCI, 2.0 mg/ml (2,000 ppm)	WestWard; Lot# BJ0051; Expiration 06/2021
Etoposide, 20.0 mg/ml (20,000 ppm)	Teva; Lot# 31325485B; Expiration 07/2021
Fluorouracil, 50.0 mg/ml (50,000 ppm)	Accord; Lot# P2001167; Expiration 01/2022
Paclitaxel, 6.0 mg/ml (6,000 ppm)	Teva; Lot# 19K24KA; Expiration 11/2021
ThioTepa, 10.0 mg/ml (10,000 ppm)	USP; Lot # R11380; Expiration 01/2022

COLLECTION MEDIA:

Table 2. Collection Media for Test Drug

TEST DRUG AND CONCENTRATION	COLLECTION MEDIUM
Carmustine (BCNU), 3.3 mg/ml (3,300 ppm)	10% Ethanol Aqueous Solution
Cisplatin, 1.0 mg/ml (1,000 ppm)	Distilled Water
Cyclophosphamide (Cytoxan), 20.0 mg/ml (20,000 ppm)	Distilled Water
Dacarbazine, 10.0 mg/ml (10,000 ppm)	Distilled Water
Doxorubicin HCl, 2.0 mg/ml (2,000 ppm)	Distilled Water
Etoposide, 20.0 mg/ml (20,000 ppm)	Distilled Water
Fluorouracil, 50.0 mg/ml (50,000 ppm)	9.20 pH Sodium Hydroxide Solution
Paclitaxel, 6.0 mg/ml (6,000 ppm)	30% Methanol Aqueous Solution
ThioTepa, 10.0 mg/ml (10,000 ppm)	Distilled Water

\*ARDL is ISO 17025 accredited by A2LA for the test methods listed on the certificates referenced on page one. Unless specified, the current specification version is used. NOTE: Non-ISO 17025 accredited test methods are designated with the \*symbol to differentiate from ISO 17025 accredited methods in the body of the test report.\*
www.ardl.com | 2887 Gilchrist Rd. | Akron, Ohio 44305 | answers@ardl.com | Toll Free (800) 830-ARDL
Fax (330) 794-6610 | Worldwide (330) 794-6600



March 10, 2021

Yu Xiaoge

Guangdong Kingfa Sci. & Tech. Co., Ltd.

Page 3 of 5 PN 157940

**TESTING CONDITIONS:** 

Standard Test Method Used: Analytical Method: Testing Temperature: Collection System:

Specimen Area Exposed: Selected Data Points: Number of Specimens Tested: Location Sampled From: ASTM D6978-05(2019) UV/VIS Spectrometry

35.0°C ± 2.0 Closed Loop 5.067 cm<sup>2</sup> 25/test 3/test

Cuff

### **DETECTION METHOD OF CHEMICAL PERMEATION:**

### UV/VIS ABSORPTION SPECTROMETRY:

Instrument: Perkin Elmer UV/VIS Spectrometer Lambda 25

UV/VIS Absorption Spectrometry was used to measure the absorbance of test chemicals, which permeated through the specimens into the collection medium. The collection medium was circulated in a closed loop through the testing period. Data collection was performed according to the programmed schedule by means of UV Winlab software from the Perkin Elmer Corporation. The list of the characteristic wavelengths is shown below.

Table 3. Characteristic Wavelengths used in UV/VIS Absorption Spectrometry

TESTING DRUG	WAVELENGTH (nm)
Carmustine (BCNU), 3.3 mg/ml (3,300 ppm)	229
Cisplatin, 1.0 mg/ml (1,000 ppm)	199
Cyclophosphamide (Cytoxan), 20.0 mg/ml (20,000 ppm)	200
Dacarbazine, 10.0 mg/ml (10,000 ppm)	320
Doxorubicin HCl, 2.0 mg/ml (2,000 ppm)	232
Etoposide, 20.0 mg/ml (20,000 ppm)	205
Fluorouracil, 50.0 mg/ml (50,000 ppm)	269
Paclitaxel, 6.0 mg/ml (6,000 ppm)	232
ThioTepa, 10.0 mg/ml (10,000 ppm)	199

### SAMPLE CHARACTERISTICS:

Table 4. Thickness characteristics for the tested: Nitrile Gloves, Style/Item No.: KG-1802, P.O./Ref No. 25007030.

Testing Dave		Augusta (mam)		
Testing Drug	Sample 1	Sample 2	Sample 3	Average (mm)
Carmustine (BCNU)	0.095	0.107	0.096	0.099
Cisplatin	0.100	0.097	0.093	0.097
Cyclophosphamide (Cytoxan)	0.107	0.106	0.093	0.102
Dacarbazine	0.103	0.093	0.100	0.099
Doxorubicin	0.107	0.099	0.092	0.099
Etoposide	0.110	0.094	0.094	0.099
Fluorouracil	0.094	0.096	0.095	0.095
Paclitaxel	0.098	0.095	0.094	0.095
ThioTepa	0.100	0.095	0.098	0.098
Weight/Unit Area (g/m2)			98.3	777-77-77-77-77-77-77-77-77-77-77-77-77

<sup>\*</sup>ARDL is ISO 17025 accredited by A2LA for the test methods listed on the certificates referenced on page one. Unless specified, the current specification version is used. NOTE: Non-ISO 17025 accredited test methods are designated with the \*symbol to differentiate from ISO 17025 accredited methods in the body of the test report.\*



March 10, 2021

Yu Xiaoge Guangdong Kingfa Sci. & Tech. Co., Ltd.

Page 4 of 5 PN 157940

RESULTS:
Table 5. Permeation Test Results on testing of: Nitrile Gloves, Style/Item No.: KG-1802, P.O./Ref No. 25007030.

TEST CHEMOTHERAPY DRUGS	AVERAGE BREAKTHROUGH DETECTION TIME (Specimen1/2/3) (Minutes)	AVERAGE STEADY STATE PERM. RATE (Specimen1/2/3) (µg/cm²/minute)	OTHER OBSERVATIONS
Carmustine (BCNU), 3.3 mg/ml (3,300 ppm)	65.3 (68.6,66.3,65.3)	0.6 (0.6,0.5,0.6)	Moderate swelling and no degradation
Cisplatin, 1.0 mg/ml (1,000 ppm)	>240 min.	N/A	Slight swelling and no degradation
Cyclophosphamide (Cytoxan), 20.0 mg/ml (20,000 ppm)	>240 min.	N/A	Slight swelling and no degradation
Dacarbazine, 10.0 mg/ml (10,000 ppm)	>240 min.	N/A	Slight swelling and no degradation
Doxorubicin HCl, 2.0 mg/ml (2,000 ppm)	>240 min.	N/A	Slight swelling and no degradation
Etoposide, 20.0 mg/ml (20,000 ppm)	>240 min.	N/A	Slight swelling and no degradation
Fluorouracil, 50.0 mg/ml (50,000 ppm)	>240 min.	N/A	Slight swelling and no degradation
Paclitaxel, 6.0 mg/ml (6,000 ppm)	>240 min.	N/A	Moderate swelling and no degradation
ThioTepa, 10.0 mg/ml (10,000 ppm)	58.3 (59.2,58.3,58.4)	0.1 (0.1,0.1,0.1)	Slight swelling and no degradation



March 10, 2021

Yu Xiaoge Guangdong Kingfa Sci. & Tech. Co., Ltd. Page 5 of 5 PN 157940

# SAMPLES RECEIVED: Nitrile Gloves, Style/Item No.: KG-1802, P.O./Ref No. 25007030



Prepared By:

Wiffany Heller Manager, Pharmaceutical Services

Approved By:

Ana C Barbur, M.S.

Vice President, Analytical & Chemical Services



## **TEST REPORT**

### EN374 TYPE B

TRA

Issued to:

Guangdong Kingfa Sci. & Tech. Co., Ltd NO.28 Delong Avenue Shijiao Town Qingcheng District Qingyuan City Guangdong Province 511500 China

Notified Body: 2777

SATRA customer number: P21017

# **EU Type-Examination Certificate**

### Certificate number: 2777/16466-01/E00-00

This EU Type-Examination Certificate covers the following product group(s) supported by testing to the relevant standards/technical specifications and examination of the technical file documentation:

Following the EU Type-Examination this product group has been shown to satisfy the applicable essential health and safety requirements of Annex II of the PPE Regulation (EU) 2016/425 as a Category III product.

Product reference: Description:

KG-1802 Disposable Powder-Free Nitrile Examination Gloves

Colour: Blue violet

Sizes: 6/S, 7/M, 8/L, 9/XL Classification:

 40% Sodium Hydroxide (K)
 6
 3.8

 30% Hydrogen Peroxide (P)
 3
 13.7

 37% Formaldehyde (T)
 6
 19.4

EN ISO 374-5:2016

Protection against Bacteria and Fungi Pass Protection against Viruses Pass

Standards/Technical specifications applied: EN ISO 21420:2020; EN ISO 374-1:2016+A1:2018; EN ISO 374-5:2016

Technical reports/Approval documents: SATRA: CHT0305030/2047, CHM0305280/2047/EN/A, CHM0305280/2047/EN/B

Signed on behalf of SATRA:

applem

Geoff Graham

Date first issued: 29/04/2021
Date of issue: 29/04/2021
Expiry date: 29/04/2026

Page 1 of 2



Contact your KINGFA representative for more information

# GUANGDONG KINGFA SCI. & TECH. CO., LTD.



NO.28, Delong Avenue, Shijiao Town, Qingcheng District, Qingyuan City, Guangdong Province, China



kingfamed@kingfa.com



www.medicalkingfa.com