QUECTEL

ESG

ENVIRONMENTAL, SOCIAL AND GOVERNANCE REPORT

2025

3 ESG 2025

2025 1 1 2025 12 31

	/
	Quectel Wireless Solutions Penang Sdn.Bhd.

GRIStandard2021
(SDGs)

1 --
14

“ ”

4 —
CASS-ESG6.0_

https://www.quectel.com.cn/

www.sse.com.cn

yiyuan@quectel.com 021-51086236-6778

;

2025 “
”

ESG

ESG

2020
198.3

E

2025

G

ESG

“ ”
1,438.83

“ ”

S “
” “ ”

2025

34

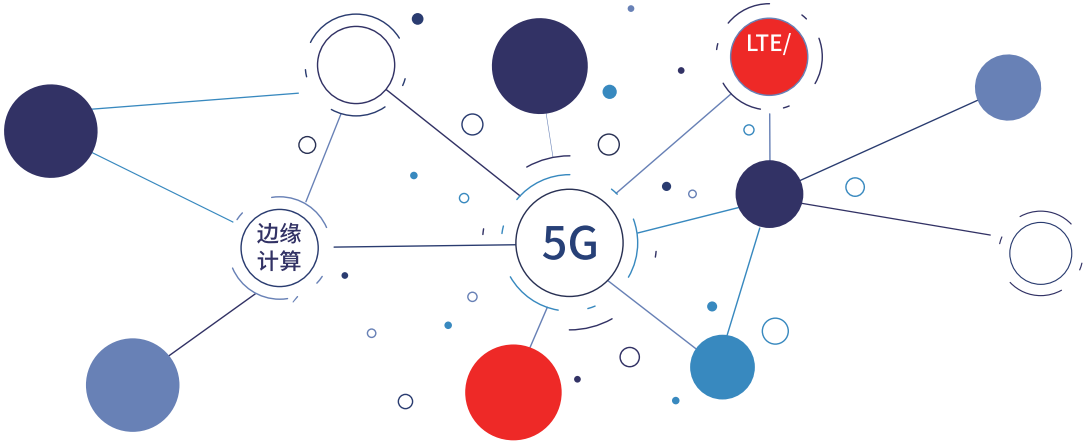
01

04
06
07
2025 08
ESG 08

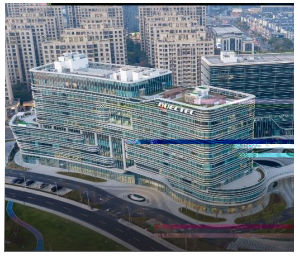
2010

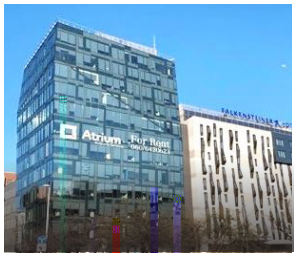
IoT
(5G/4G/3G/2G/LPWA)
5G/4G/
(Wi-Fi&BT) GNSS

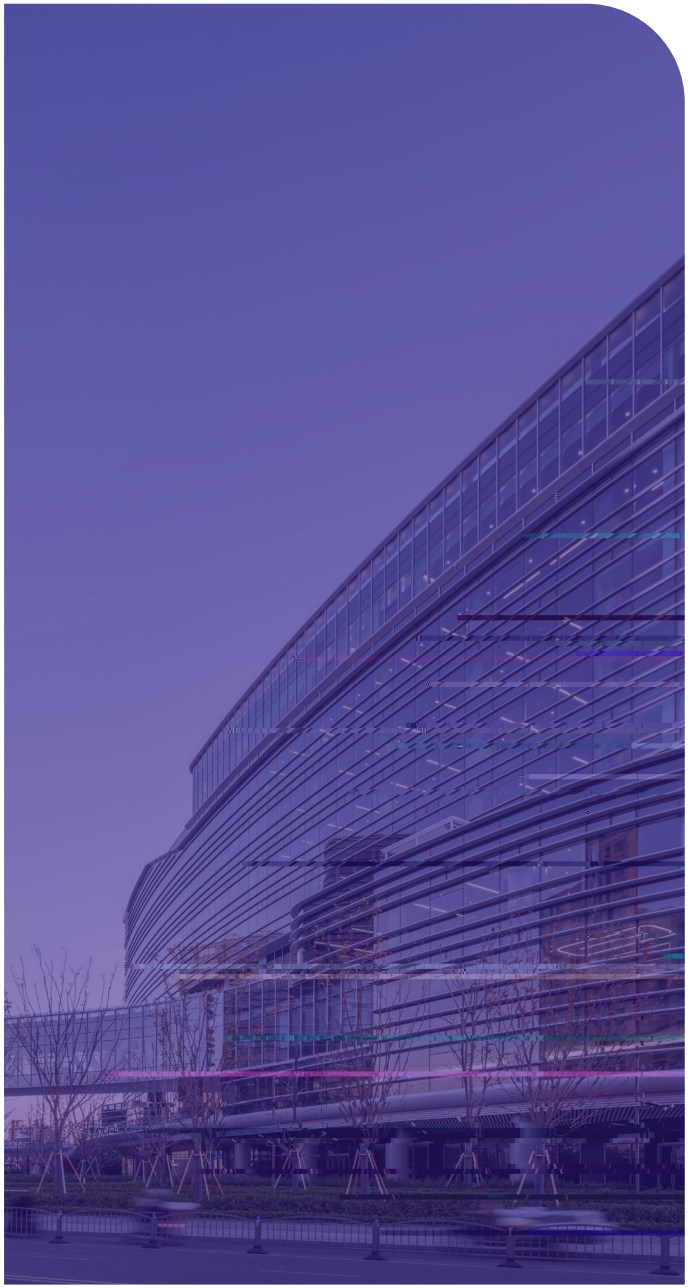
&
&



-
- 5G-A AI
- ( )







- 5G
- 4G
- LPWA
-
- 3G/2G

- 5G/ 4G/
- V2X
- /
- GNSS
- (Wi-Fi/ Bluetooth / UWB/)
-

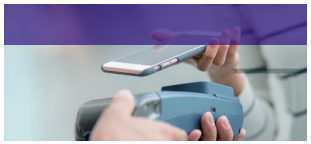
- 5G
- 4G
-
- SBC
- AI Box

- Wi-Fi
- Bluetooth
- Zigbee/ Thread
- LoRa/ Wi-SUN/ WM-Bus/ other Sub-GHz
- Wi-Fi HaLow
- Amazon Sidewalk
- Matter
- UWB
-

-
-
-
-
-
-

- OBD
- DVR
- UBI

-
-
-
-
-
-



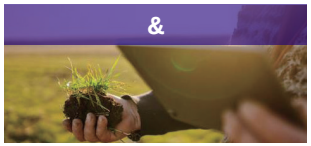
-
-
- POS
-
- ATM
-

-
-
-
-
-
-

- LED

-
-
-
- DTU
-
-
-

- VOIP
-
- Wi-Fi



-
-
-
-
-
-

-
-
-
-
-
-

- PDA/

- /

&

-
-
-
-
- PC
-

-
-
-
-
-
-

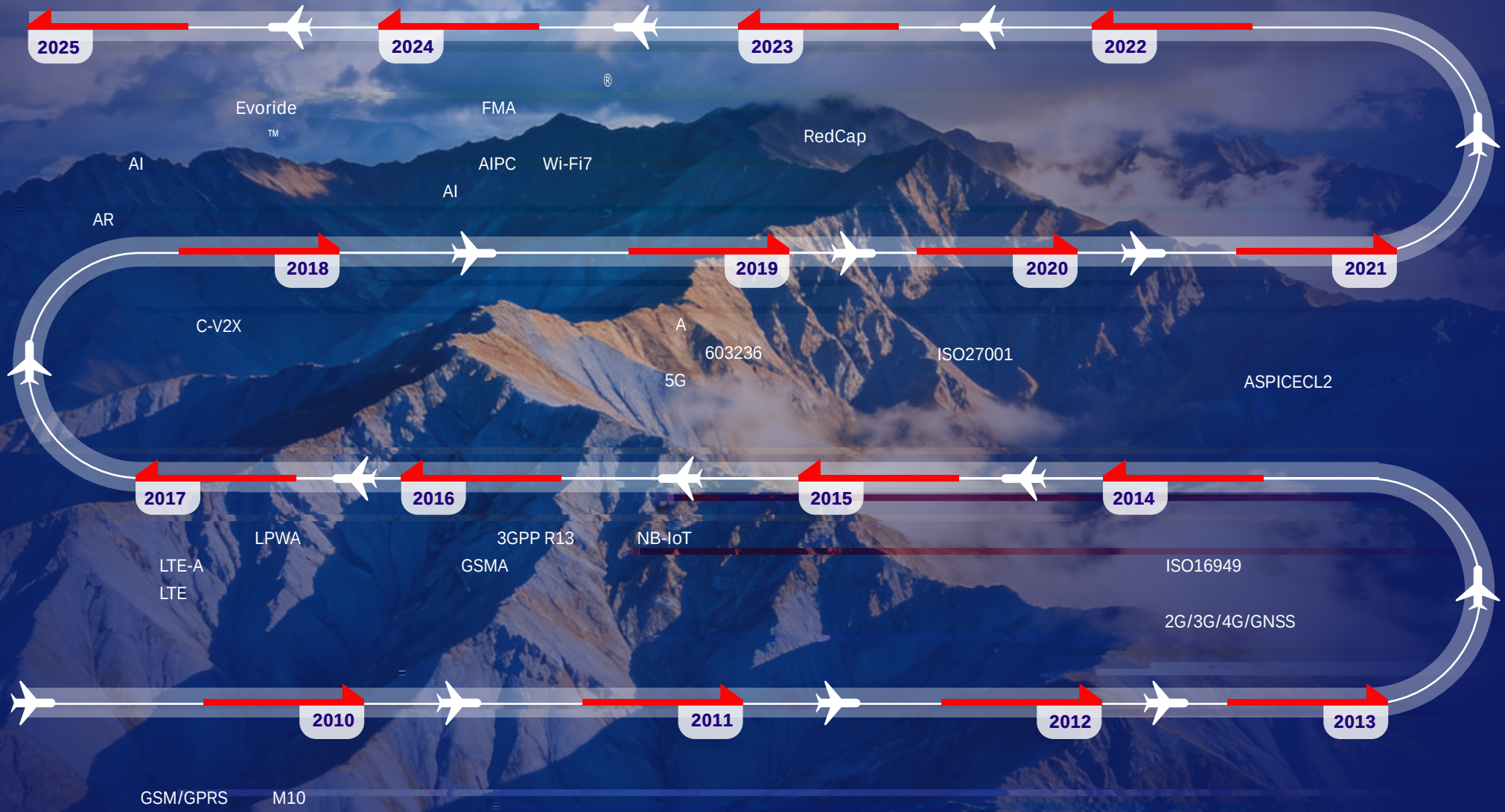
GNSS

- DR
- RTK
-
-
-
-
-
- IMU

-
-
-
-
-
-
-
-
-

- AI+
- XR
-
-
-

-
- ODM/ JDM
- EMS
-
-
- RTK
-
-


2025
2024
2023
2022
Evoride
™
FMA
®
RedCap
AI
AIPC
Wi-Fi7
AI
AR
2018
2019
2020
2021
C-V2X
A
603236
ISO27001
5G
ASPICECL2
2017
2016
2015
2014
LPWA
3GPP R13
NB-IoT
LTE-A
GSMA
ISO16949
LTE
2G/3G/4G/GNSS
2010
2011
2012
2013
GSM/GPRS
M10

2025

2025

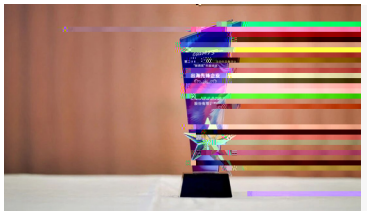
“ — ”

“ 2025 -

”

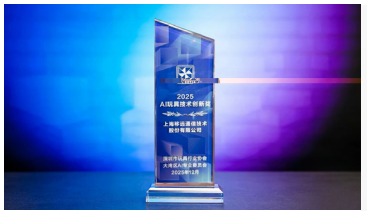
2025 -

“ ” “ ”



®

+ “ ”



2025 AI -

“ AI ”

ESG

243.26

8.37

169.14

82

20%

23%

405	38.39	100%	100%	101
21,356		19.51	8.02%	68.13%
778	CSR 100%	198.3	1,583	

161.03	ISO14001	271.7	0.016 tCO2e/

02

ESG

11
11
13
15

ESG ESG
ESG

ESG

ESG
ESG ESG
ESG

ESG ESG
ESG
ESG

ESG

2025 ESG ESG
EcoVadis ESG

2025 ESG

EcoVadis	Wind ESG	ESG
EcoVadis Committed	AA	A

ESG

ESG

ESG

ESG

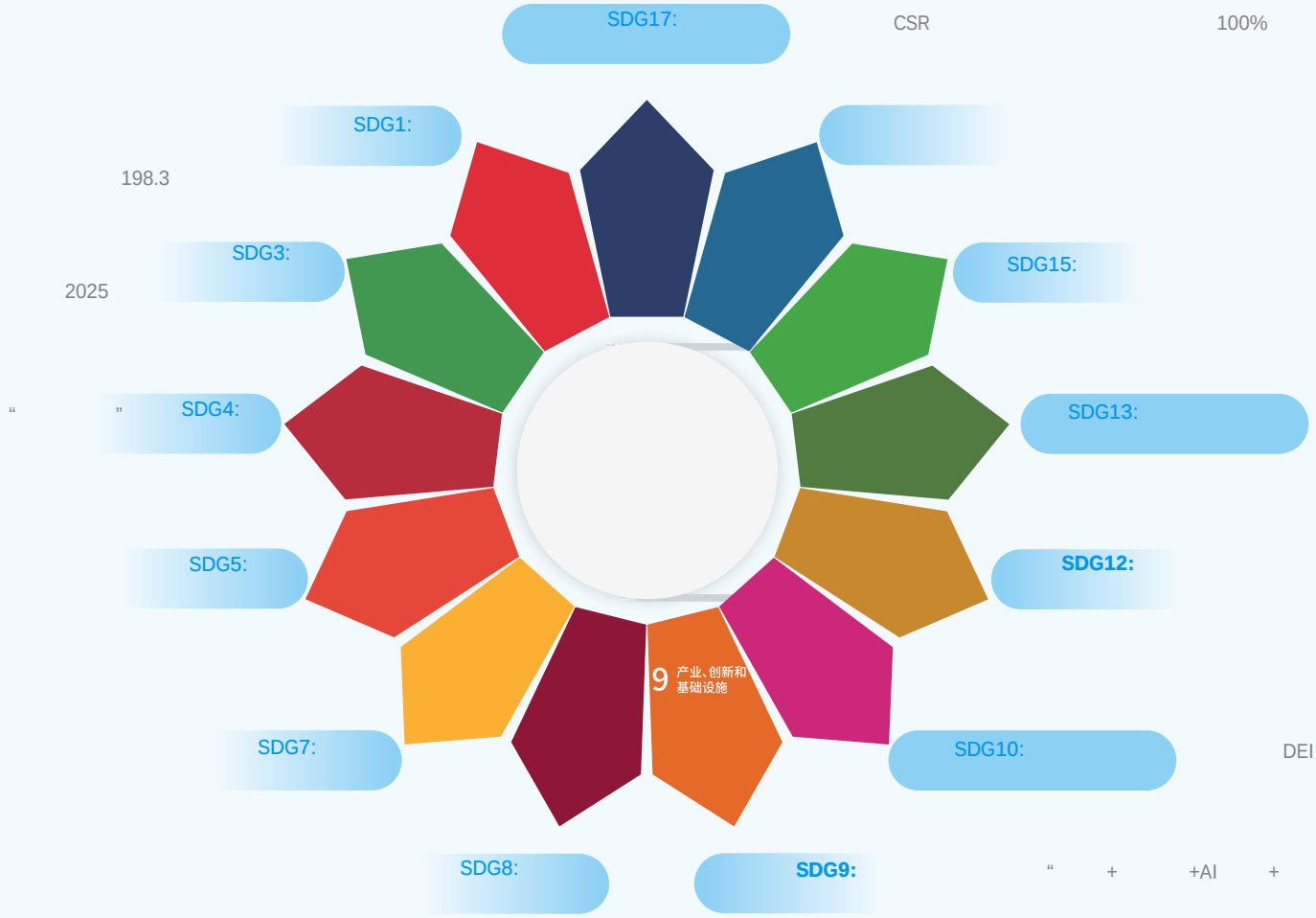
ESG

ESG

ESG 2025 11
ESG

ESG ESG
— ESG 2025

2030 UNSDGs2030



“ ”

2025

159

01

02

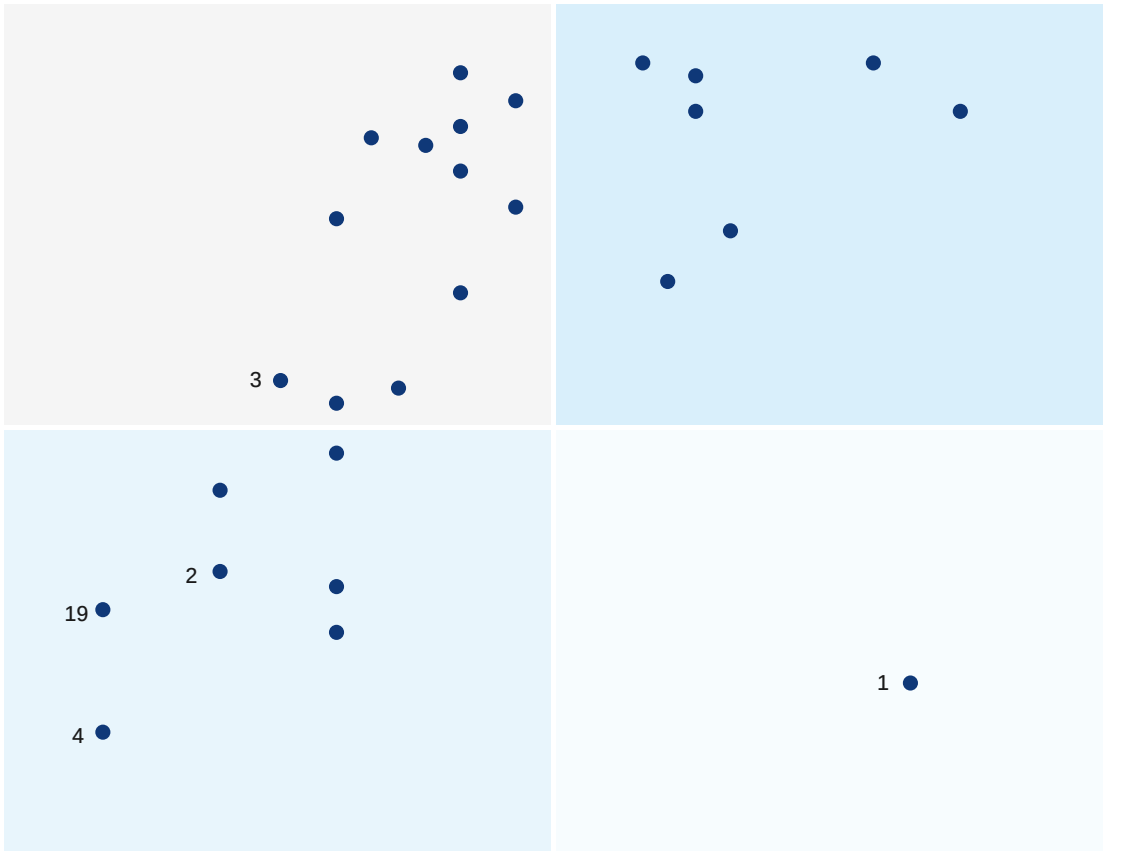
03

04

e

2025 27 9 13 5 “ ”

“ ”



1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27

ESG

ESG

ESG

ESG

ESG

ESG

“ ”

	/			
	•	• • • •	FAE	
	•	• • •	ODM	
	•	• •		
	•	• • ISO27001	ISO27701	
	• AI 6G	• AI 5G •		
	•	• •		

--1 1--5 -5

03

19
22
25
28
31
31
32
34

2 RCP8.5	2100 3-4
2 RCP2.6	10

TCFD

RCP2.6 RCP8.5

		AI	+ AI	“ + +AI + ”
	AI			
	ESG		ESG ESG ESG	

--1 1--5 -5

01 02 03 04

3,000

11.18 271

		2025
		61.46
		38,331.42
		38,392.88
	/	0.016
		1,438.83

2025 12 2023

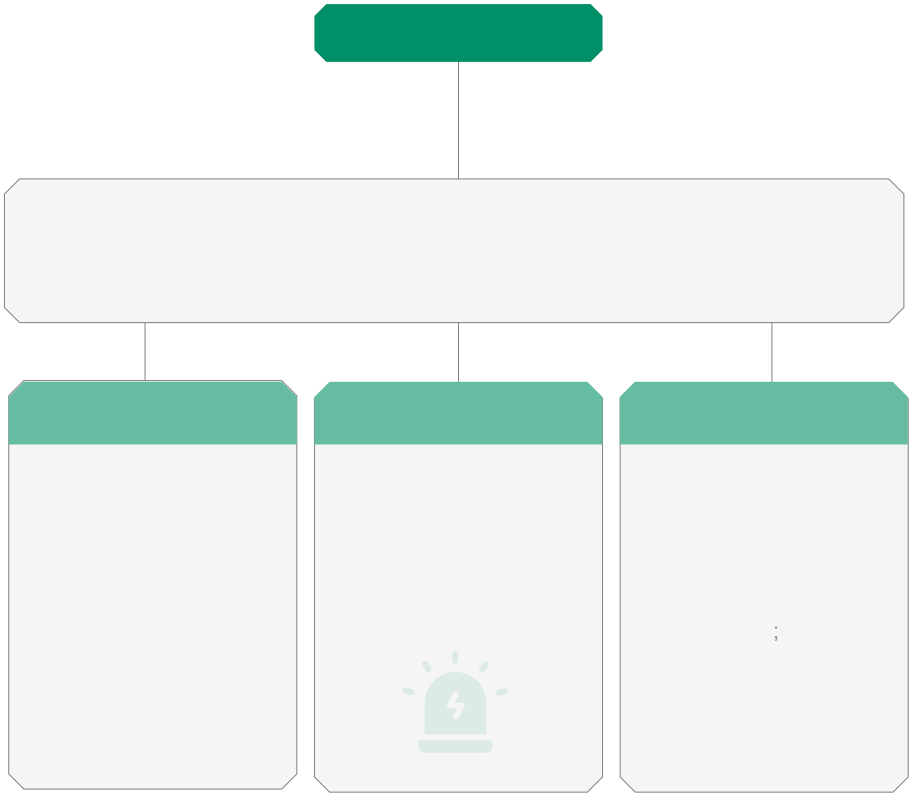
161.03

ISO14001

ISO14001

“ ”

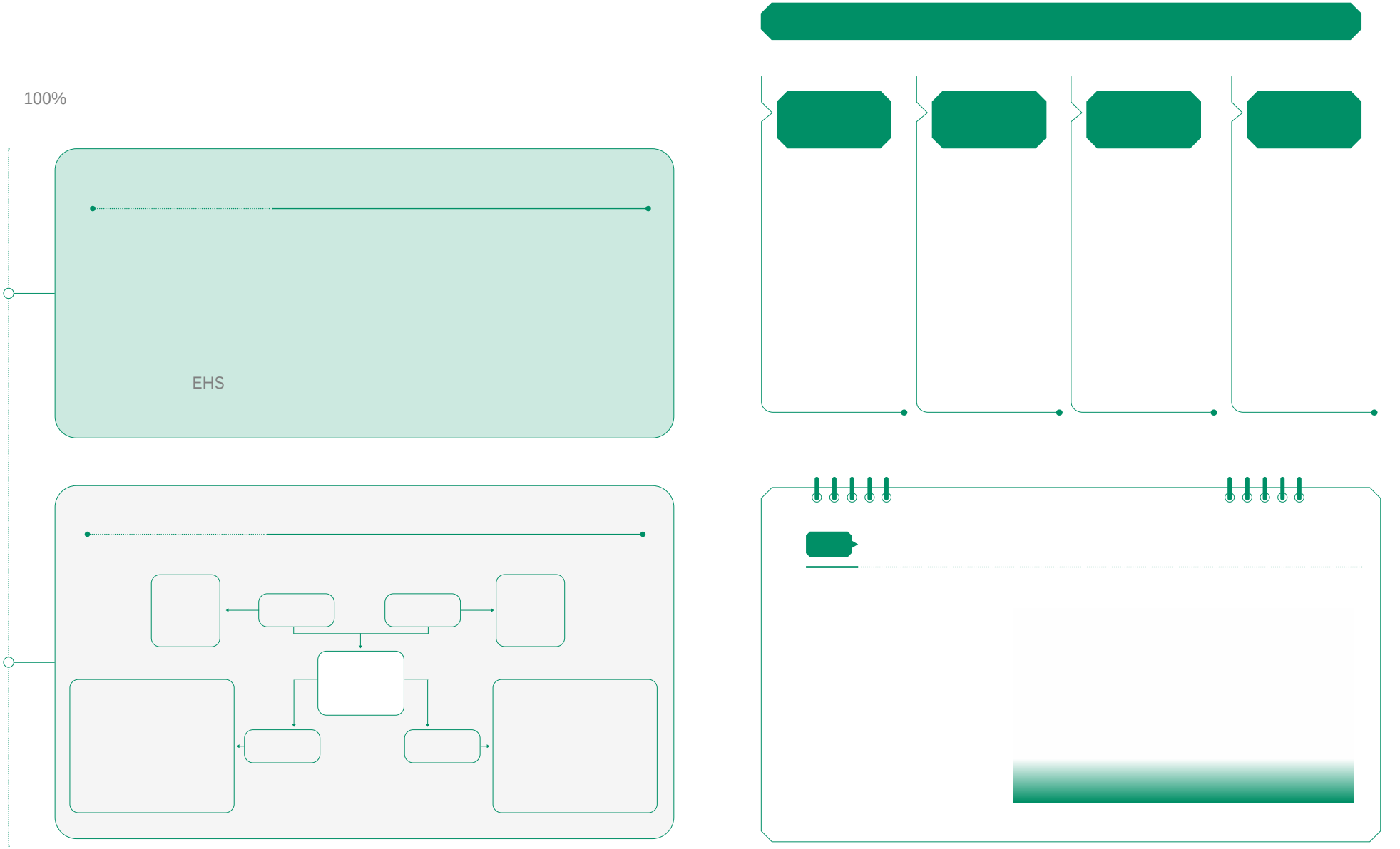
“ — — — — ”



“ ” “ ”

.....	

&


100%
EHS

2025

EHS

EHS 100%

2025

117.5

8,726

100%

100%

2025

0

100%

100%

2026

2025 5%

2026

2026

2025

70%

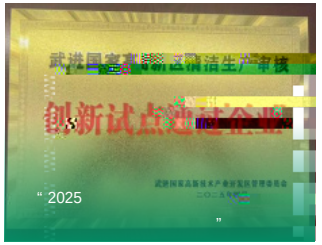
				• + •

		2025
PM		0.35
		0.329
		181,422.35
COD		3.6
BOD		3.6
		1.56
		1.1
		0.04
	/	0.075

		•
		• 100%
		• • •

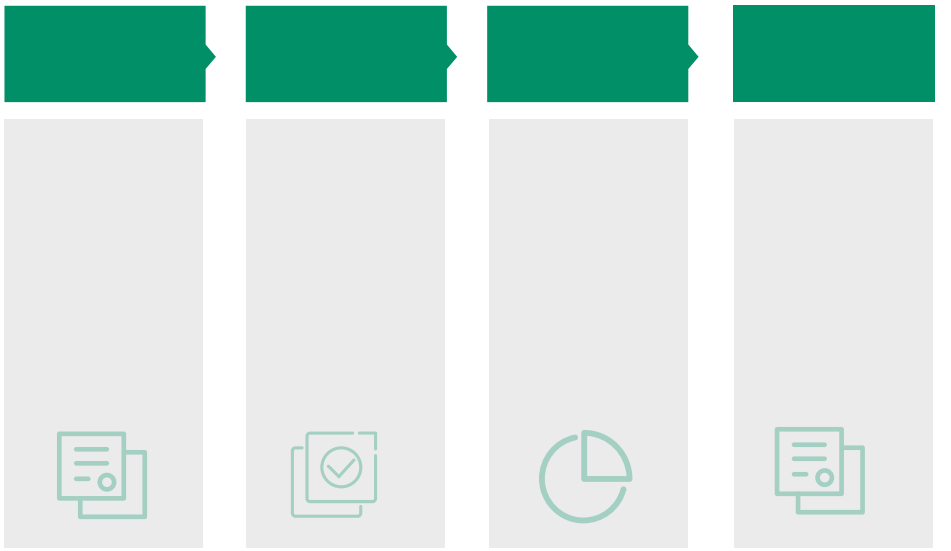
		2025
		1,904.79
		75.19
		1,829.60

“ 2024 ”



“ 2025 ”

/



2025	368.86

	2	

	“ ”	
		0.9

	• • • 1,250kW : • • • 5,300kW
	• • •
	• • •

2025 10 2025 21.69

2026

2026 2025 2026

		2025
		7,185.33
		1,873.54
		16.84
		3.46
		8,925.40
	/	0.004
		271.17
	%	5.3

“
”

2026 2025

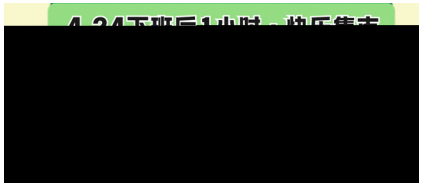
		2025
		273,156.69
	/	0.112
		700

		2025
		22,924.42
		1,790.59
		663.82
		556.25
		1,810.14
	%	95.03%

FUN

2025 “ ” “ ”

“ ”



+10% 3R

156

3R

“ ”

2025

“ ”

3mA/12V

5G

— HCM511S MCU

HCM511S LCC 16.6 mm × 11.2 mm × 2.1 mm 0.57

5.4

+6 dBm

— KCM0A5S Wi-SUN

KCM0A5S 28.0mm x 22.0mm x 3.15 mm LCC

-40 +85

IEEE 802.15.xg/e Wi-SUN FAN 1.1

2.4 Mbps

RTK GNSS RTK

AI + ≤ 1.5
85% VOC
SLAM 3D
5%-30% 1 10 CO2

“
”

“ ”

APQP

“ - - - ”

ISO9001 IATF16949

99	920	560
	.....	

ISO9001

15000+

17000+

8700+

+

“ ”

“ - - - ”

2025 27

-
-
-
- “ ”

-
-
-
- PCBA

- SPC
-
-

-

RoHS REACH
PBB

RoHS

RoHS

RoHS

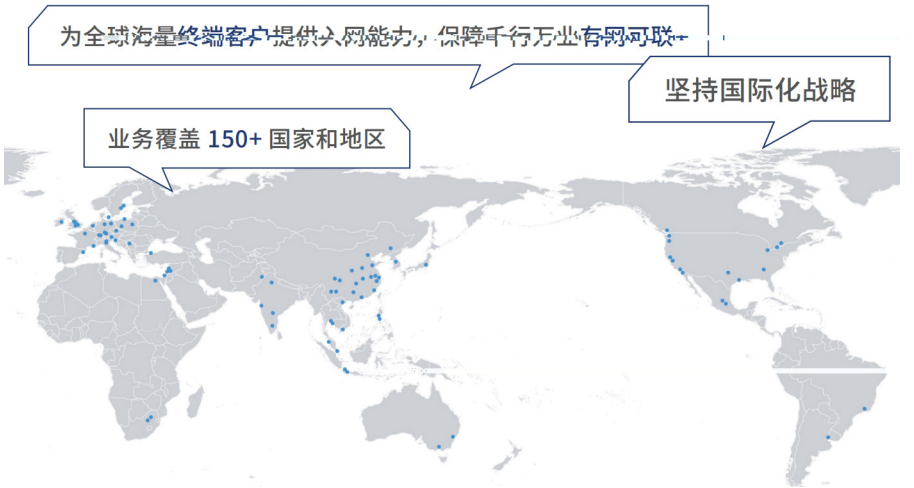
2025
31 Lesson Learn

PR VIS

2025
+
45
24

+

2025
360
Python Smart 4G/5G
Open GNSS

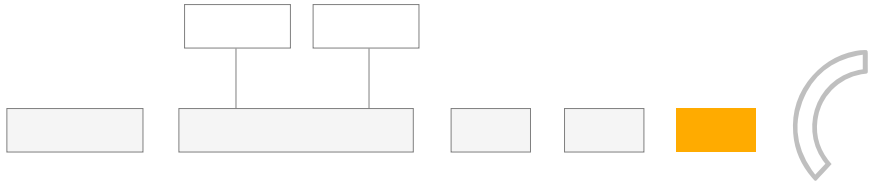


“ ”
2025
60
21.9 +

FA Return
Material Authorization Instructions
7 × 24

“ ”
Chatbot

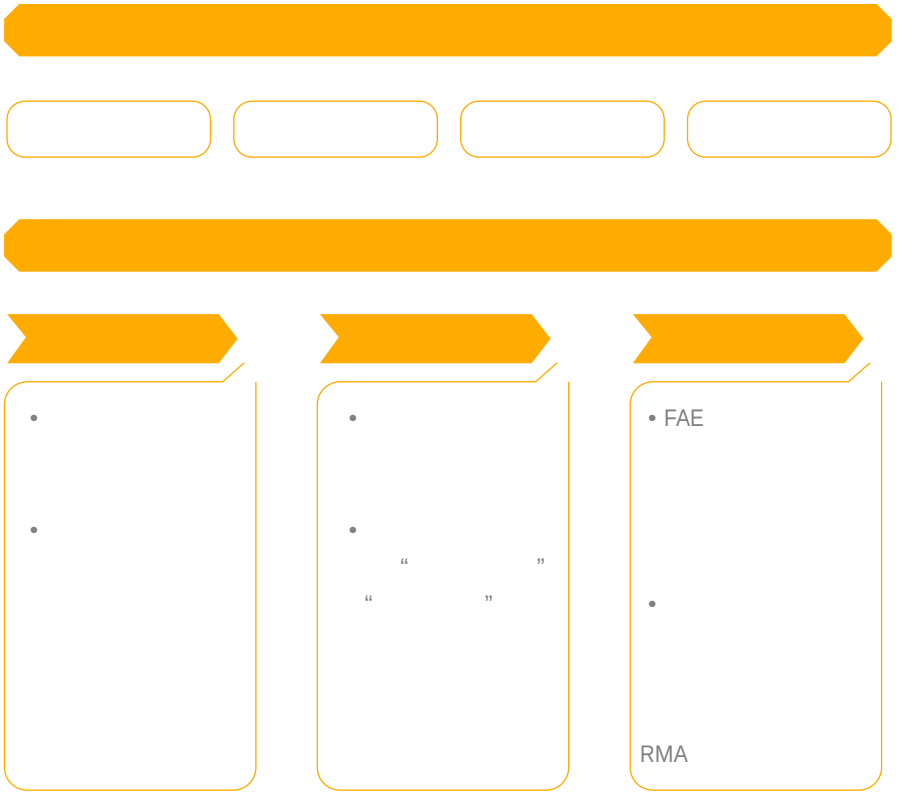
“ ”
”



QQ

/

	• Confluence 2025 2,904 • “ ” Top3
	• BBC News
	• • 2025 790 38 820+ • FAE 2 “ + + ”



6 36

“ ”

14 e-service

JSD

2025

		2025
		99.82%
	0%	
		2025 1,300 CCC,NAL,SRRC CE FCC IC JATE,TELEC KC ANATEL 260 1000 8,700+
		91.8% 90% (FAE) 99.5% 98.26%
	90%	92%
	100%	100%

2025 15 600

“ ”

CNAS

ISO17025/CNAS

PCBLayout

debug

R&D OTA

EOL costdown

8D

” “ ”

“ + ”

2025 AI 5G

AI “ + ”

“ + ”

“
”

“ ”
2025
103
47

2025 “
” 1,700

—

2025 “ ”
109 5 30+
1 2 “
→ + → ”

2025
12 560 95.81

2025

GB/T29490 “ ” “
”

3GPP
CCSA
2025 2 11
3GPP
5G-A

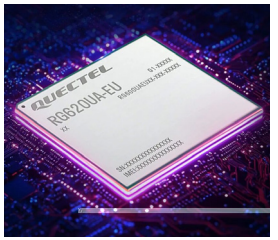
5G AI
/ AI

2025 2,008

2025

FWA “ 5G+AI ”

RG620UA-EU5G V20 ,
CPE “ 5G+AI ”
R16 —
SA 4.67Gbps 1.25Gbps
AI



LTE “ ”

LTE

“ ” D2C

“ + ”

GNSSLG290P ,

GNSS

LG290PGNSS RTK

± 1cm

15%-20%

Robrain AI V2.0

Robrain AI V2.0

AI

AI QSM882GP

AI

2025

45.84%

197

	2024	2025
( )	4,184	6,102
(%)	71%	68.13%
(,CNY)	16.69	19.51
(%)	8.97%	8.02%
	219,500	200,161
%	91.5%	93%

		2024	2025
		568	778
		199	308
		440	659
		303	327
		363	327
		7	6
		51	81
		88	110

“ ”

- SMT PCB
- 100%

- AGV AGV
- WMS MES “ ”
- WMS
- 90% BPM

- SAB WMS QMS MES
- EMS MES

- 2025
-
-

2025 “ + +AI + ” + AI

DynaBlue “ ® ”
® AI LXC FMA
QuecOpen FBS
AI TCU FSC200
SOP 5GR18 FPS100
AI AI
PIN
GNSS
LG680P

VA500-GLAI
AI
FGM842D
Wi-Fi4&BLE5.2
RD6000CC

AI

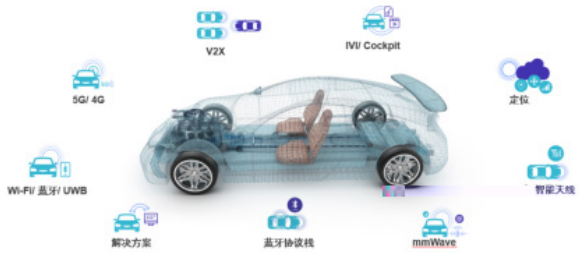
™

2025 VAS ValueAddedService AI ™
AgenticIoT AI
AI •
Robrain ATEX
• WEB/APP OTA
Wi-Fi RS-485

V2X

2025 V2X

10%-20% 15%



AI

“ 4G AI ” “ +AI ” “ ”

- 4G EC800M-CN
- AI
-

2025 AI AI 5G

5G-A AI

AI AI

AI AI

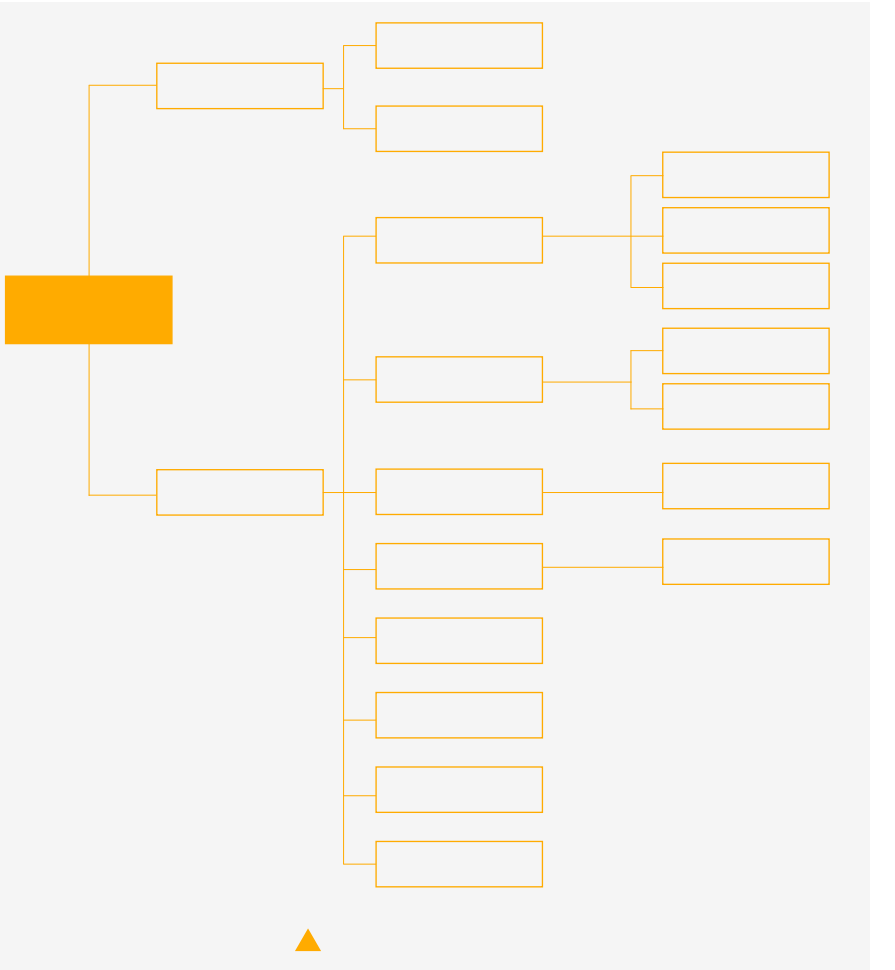
2025

ISO/IEC27001

ISO27701 ISO21434

TISAX2

AI	
AI	• AI AI • AI AI
	• AI
	• AI • AI
	•



IT	AD IT	

	90	%
	100	%

	• POC • •

ISO27001 ISO27701 ISOSAE21434 TISAX

BIA 5

IT

FTP SharePoint OneDrive

PI

2025

13 2,400

100%

5 4,768 561

100%

2025 “ ”

ISO21434 GB/T32960

2025

DIPA

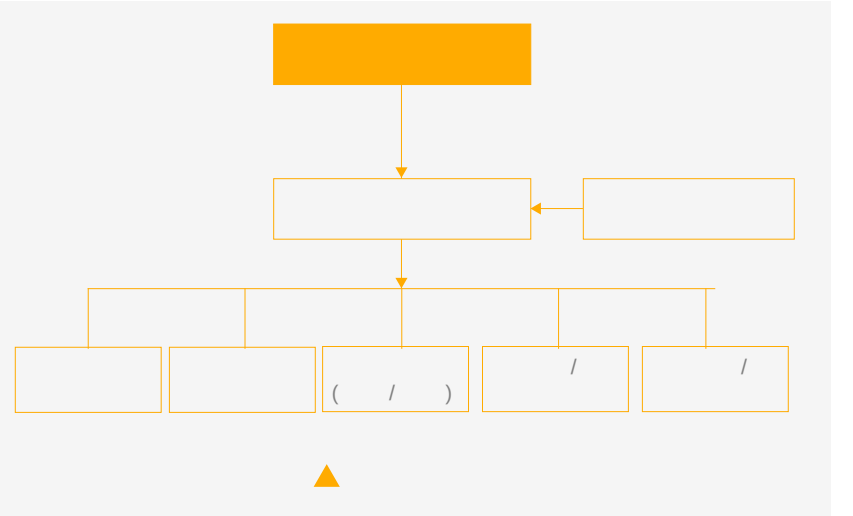
DIPA

HSM

TLS

WPA TARA HSM

		2025			
	0	0	0	0	0
	0	0	0	0	0
(30)	0	0	0	0	0
	100%	95%	95%	92%	98%
(	100%	0	0	1	4



-
-

- /
- /
RoHS
- /
RoHS REACH

RoHS

ESG ESG

ESG “ ” “ ” 80%

10%

CSR

ESG		
		1

•

,

•

24

Ő

Л

-
-
-

AEO

- AEO

AEO

2025	
	544
	35
CSR	100%
	100%
ISO14001	234
ISO45001	109
/	98.71%

RoHS REACH
2025

REACH

AIoT

AI 5G

“ - ”

3GPP
CCSA
GSMA

2025 MWC

2025
MWC
3Tx L4S RG620T RG660MK 5G
5G AI

Robrain AI
“ ”

WAIC 2025

2025 7 WAIC 2025
AI
WAIC “ + ”

CIIF 2025 AI

2025 9 “ ” 2025 CIIF
® AI
AI SOP AI AI PIN
“ ” “
” “ AI ” ®
AI+

Robrain AI IHR 2025

2025 10 “ • ” 2025 IHR 2025
Robrain AI “ + ”

“ ”

18

Moka

2025

100% 100%

“ + ” “ + ”

2025

2025

35

587

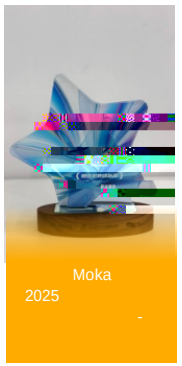
3,708

770

12.31%

12.31% 7.6%

AI



Moka

2025

2025

2025

4

PCB

& “ ” APP

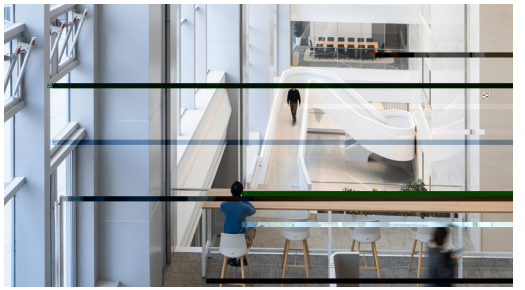
“ ”

2025 8 “ ” “ ” APP

-

2025 12 “ ”

/ /



2025

2025 7 2025

“ ”

“ ” HR

,

2025

939.51

87%

8.09

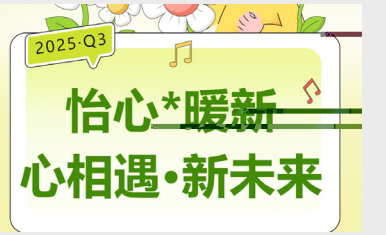
187.39

31.95%

- EIP
- CEO

- 0~14
- /

CEO



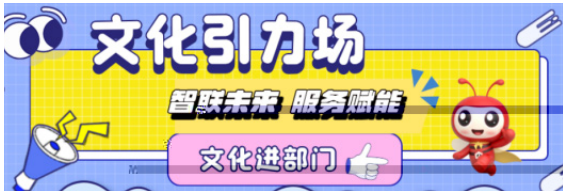
	• / • / • • “ ” “ ” “ ”
	7 ( )

2025 118

" "

2025 3 “ ”

2025 8 “ ”



IT

2025 5,098

- 98%
- 95.94%
- 94.6%
- IT 94%
- 93.51%
- 93.4%

“ ”

“ ”

ESG

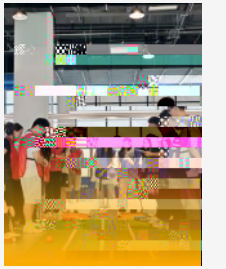
“ ”

2025 1,700

2025 1,621

2025 120 “ ”
48 400+
“ + ”
2025 100%

30 2025
8,000
8,000



2025 300+
“ ”
“ -
” 98% “ ”
“ ”

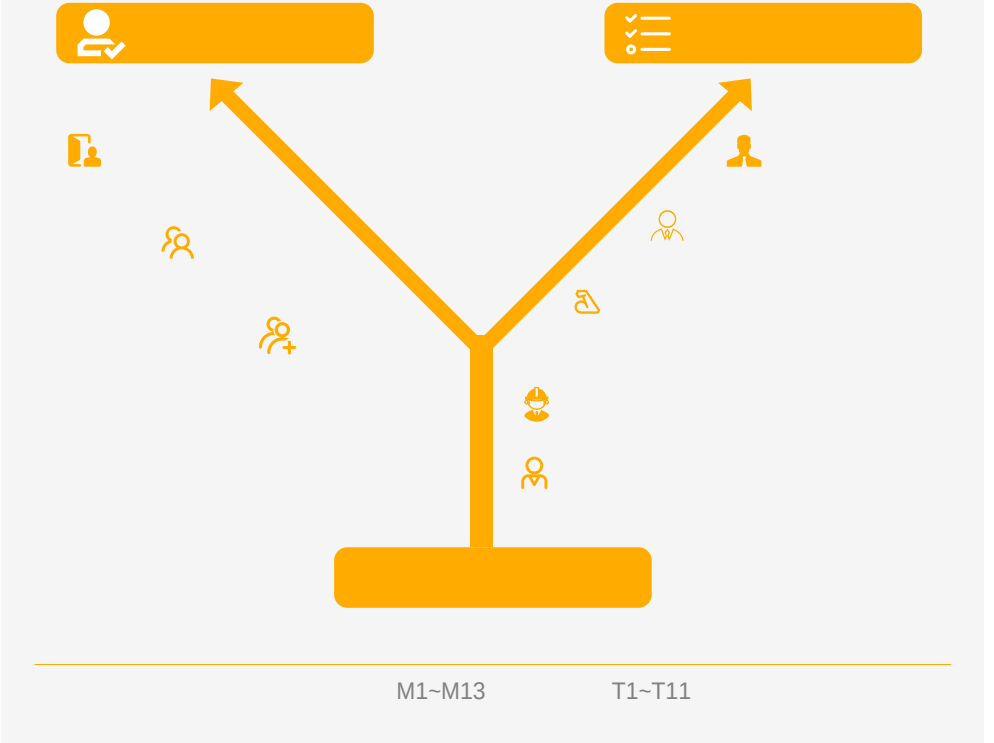
2025
43

	2025	
	405	
	343,797	
	38.39	
	97.7	%
	58,695.6	
	96.2	%
	21,726.9	
	98.3	%
	1,056.8	
	100	%

“ ”

“ ” “ ” “ ” “ ”

” “ ”



“ ” “ ” “ ”

“ ” M1

“

”

“ ”

“ ”

“ ”

/

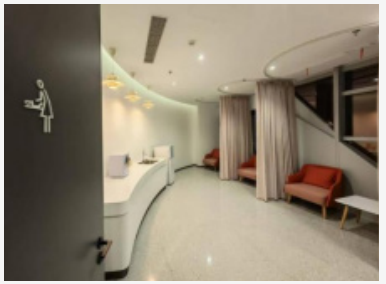
10 42 4,266 98.9%

	“ 520 — er ”	
	12 66 4,290+	
	— •	
	“ ” 1,700 99.3%	

2025 101 31.1

2025

2025 80 40,000



2025

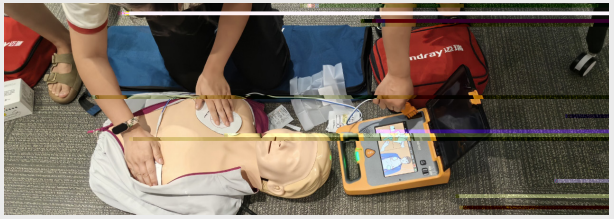
DIY

“ - - - ”

“ — — ”

26 AED 5 +

AED



“ — —
”

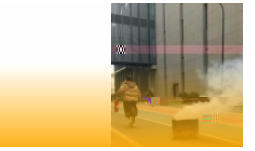
“ + + ”

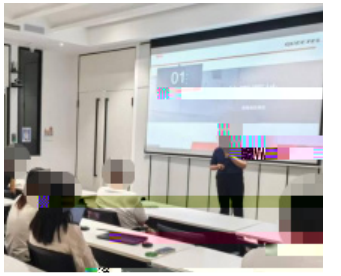
2025	
	151.5
	21,356
	1,982

“ ”

EHS

EHS





	2025	
	61.18	
0%		
100%	339.95	
100%	66.82	
	789	100%
100%		

AI

PPP AI

“ ”

FMA ≥ 30% 18%

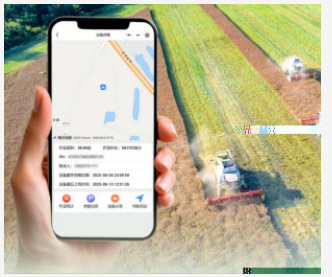
75% 97%

AB

“ ”

FMA310

FMA210



NB-IoT 5G

AI

®AI

“

” “ ”

“ ”

“

”

5G

	5G/5G-A AI 100 “ 5G+ ”

“ + ”

“ ”

“

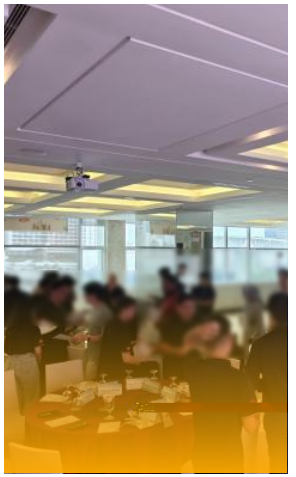
”

2025 2.69

“

”

- 160
  15
- 0 1 8 96



2025

“ • ”		2025 “ • ” “ ”
“ ”		

2

	2025 “ ” 1,772 96.3 2025 12	
	2024 3,499 2025 3	

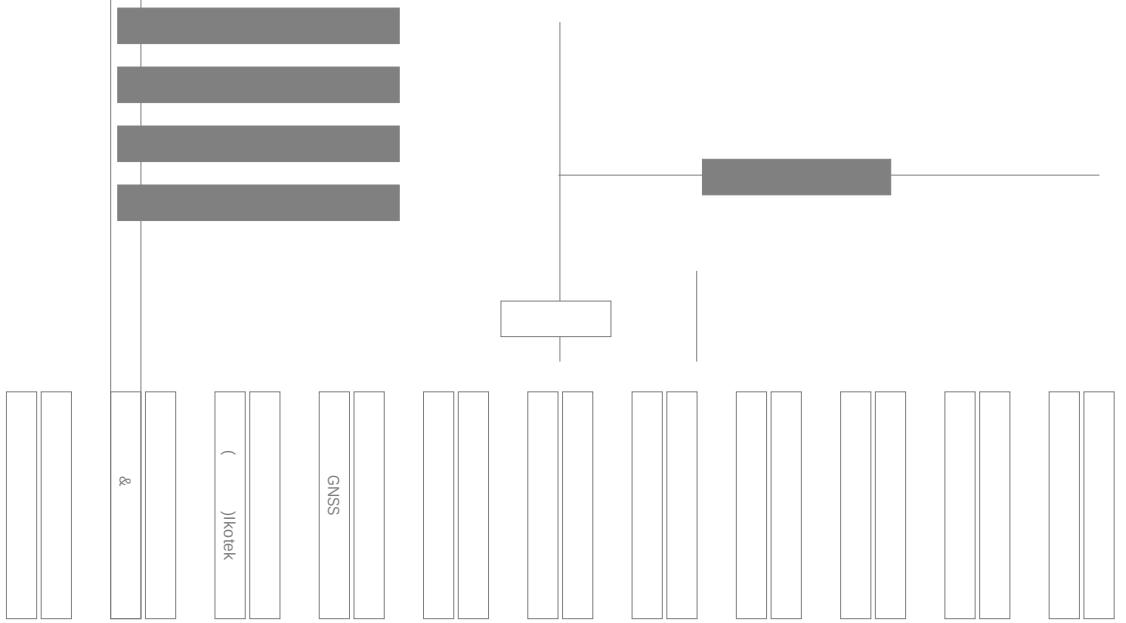
“ ”

2020 475.01
12,135

2025 100

2025		
	618	
	44.14	
	1,583	
	198.3	

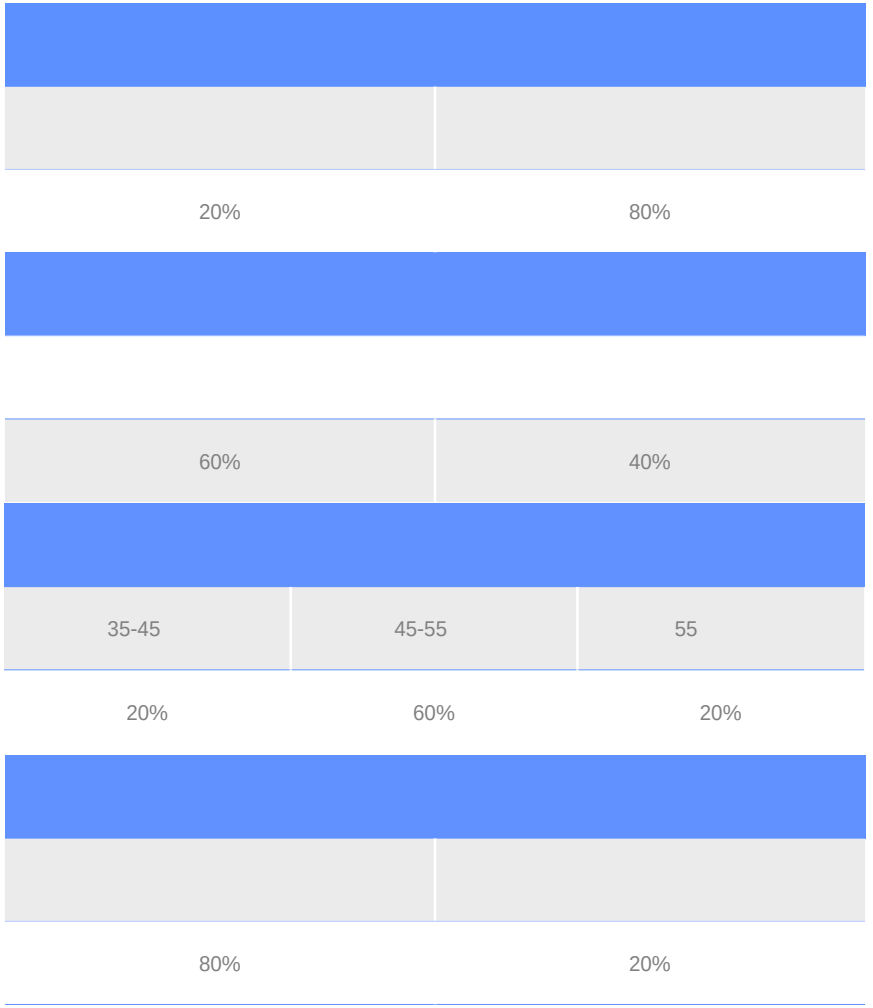
QUECTEL



2025			
	1	3 2	28 100%
		4 100%	25 100%
		8 100%	77 100%

	5	14
	2	5
	0	0
	1	6
	100%	

“ ”



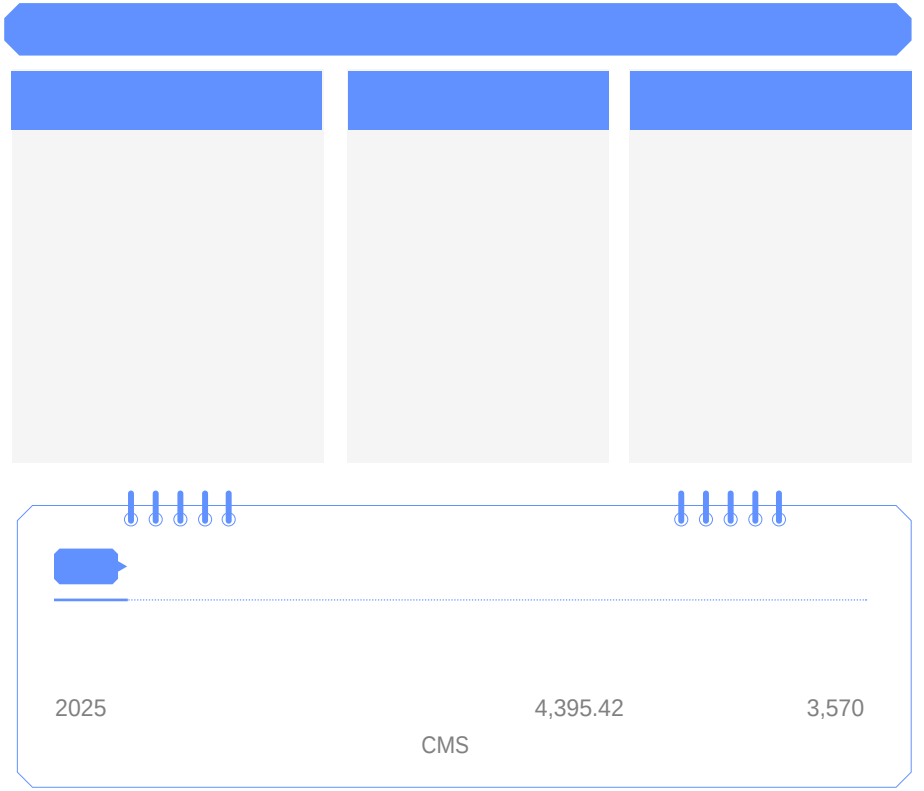
2025

5 2 40%

ESG

2025

137 4 133
2025 B 2022~2024 A
ESG Wind ESG AA, ESG A EcoVadis
Committed



2025 4,395.42 3,570
CMS

“ ”

(2020)

2025

-
- 656 79%

/

	•
	•
	• 100%
	•
	•
	•
	•
	•
	•
	•

/ “ ” 2025

“ ”

2025		
	2,834	
	178	
	100	%
	26	
	100	%
	2	
	1	

EIP

14 —	

GRI Standard 2021		
GRI 2		
2-1		
2-2		
2-3		
2-4		
2-6		
2-7		
2-8		
2-9		
2-10		
2-11		
2-12		
2-13		
2-14		
2-16		
2-17		
2-18		
2-19		
2-20		
2-22		
2-23		

GRI Standard 2021		
2-24		
2-25		
2-26		
2-27		
2-28		
2-29		
2-30		
GRI 3		
3-1		
3-2		
3-3		
201		
201-1		
201-2		
203		
203-1		
203-2		
204		
204-1		
205		
205-2		

GRI Standard 2021		
205-3		
206		
206-1		
207	2019	
207-1		
207-2		
207-3		
301		
301-1		
301-2		
301-3		
302		
302-1		
302-2		
302-3		
302-4		
302-5		
303		
303-1		
303-2		
303-3		

GRI Standard 2021		
303-4		
303-5		
304		
304-2		
305		
305-1	1	
305-2	2	
305-4		
305-5		
305-7	NOX	SOX
306		
306-1		
306-2		
306-3		
306-4		
306-5		
308		
308-1		
308-2		
401		
401-1		

GRI Standard 2021		
401-2		
401-3		
403		
403-1		
403-2		
403-3		
403-4		
403-5		
403-6		
403-7		
403-8		
403-9		
403-10		
404		
404-1		
404-2		
405		
405-1		
406		
406-1		
408		

GRI Standard 2021		
408-1		
409		
409-1		
413		
413-1		
414		
414-1		
414-2		
416		
416-1		
416-2		
417		
417-1		
417-2		
417-3		
418		
418-1		

移远通信