Advantech AE Technical Share Document

Date	2023/11/08	SR#	1-3043726833
Category	■FAQ □SOP	Related OS	N/A
Abstract	What is Data Format Definition of WISE-4000 System Log in JSON Format (Cloud Upload and Push Notification)		
Keyword	WISE, Comparison table, Cloud, upload, push, system log, error code.		
Related Product	WISE-4012, WISE-4012E, , WISE-4050, WISE-4051, WISE-4060, WISE-4010LAN, WISE-4050LAN, WISE-4060LAN, WISE-4210, WISE-4220, WISE-4470, WISE-4471		

■ **Problem Description:**

What is the behavior of WISE when the cloud server is disconnected? Can user check system log of WISE to understand the data upload/ push success or not?

■ **Brief Solution:**

The following tables show the behavior and system log record if data upload/ push fail or WISE is disconnected with AP/ cloud server. Firmware version before VA1.10 B00, has different behavior with latest version since VA1.10 B00.

Firmware version before VA1.10 B00	Event	System log
Data upload	Fail	1. There is 3 times retry action. 2. Log "event 4" 1 time with a kind of sample error code*. (Error code ➜ 1: Connected fail, 2: Send data fail) 3. Put old data and new data in next uploading interval.
	Recover after fail	No action
Push	Fail	1. There is 3 times retry action. 2. Log "Event 5" 1 time with a kind of sample error code*. (Error code ➜ 1: Connected fail, 2: Send data fail) 3. Data abandon.
	Recover after fail	No action

*Error code table

Code	Event	Detail
4	Cloud file upload	1: Connect to server error
		2: Upload data fail
5	Cloud data push	1: Connect to server error
		2: Push IO data fail
		3: Push System data fail

FW VA1.10 B00 and after this version	Event	System log
Data upload	Fail	1. There is no retry action. 2. Log "event 4" 1 time with 1 kind of error code** 3. If error code changes, log again with new error code 4. Put old data and new data in next uploading interval.
	Success after fail	Log "even 4" 1 time
Push	Fail	1. There is no retry action. 2. Log "event 5" 1 time with 1 kind of error code**. 3. If error code changes, log again with new error code
	Success before fail	No action
	Success after fail	Log "event 5" 1 time

**New error code table

Code	Event	Detail	
4	Cloud file upload	**Byte 3, 2** Index 0: I/O 1: System 2: Node data (WISE-4210 series)	**Byte 1, 0** Error code See the table as below
5	Cloud data push	**Byte 3, 2** Index 0: I/O 1: System 2: Node data (WISE-4210 series)	**Byte 1, 0** Error code See the table as below

A. Common Error Codes

0	None
1	Host name is invalid
2	DNS query was failed.
3	Connection to host was failed.
4	Disconnect from server abnormally
5	Send header to server failed

6	Send data to server failed
7	Fail to receive response from the server
8~9	Reserved for common error
10	Other HTTP error code
11	HTTP 400 Bad request
12	HTTP 401 Unauthorized
13	HTTP 403 Forbidden
14	HTTP 404 Not found
15	HTTP 409 Conflict
16	HTTP 429 Too many request
17	HTTP 500 Internal error
18	HTTP 503 Service unavailable
19	HTTP 507 Insufficient storage
20~29	Reserved for HTTP & PrivateServer

B DropBox Error Codes

30	Bad input parameter for Dropbox
31	Bad or expired token for Dropbox
32	Bad OAuth request (wrong consumer key, bad nonce, expired timestamp...).
33	Your app is making too many requests for Dropbox.
34	Transient server error for Dropbox
35	User is over Dropbox storage quota.
36~49	Reserved for DropBox

C Aliyun OSS Error Codes

50	Faile to receive response from the server of Aliyun OSS.
51	Access the server of Aliyun OSS was denied.
52	Access ID was invalid for Aliyun OSS.
53	Bucket name was invalid for Aliyun OSS.
54	Internal server of Aliyun OSS error.
55	Bucket was not existed on the server of Aliyun OSS.
56	Request time too skewed to the server of Aliyun OSS.
57	Request to the server of Aliyun OSS was time-out.
58	Access Key does not match.
59	The file already existed on the server of Aliyun OSS.
60~69	Reserved for Aliyun

D Azure Error Codes

70	Upload file already exists.
71	Incorrect received storage account information.
72	Invalid IOT Hub authorization
73	Excessive request to upload
74	Azure storage connection fail

75	Invalid Azure storage authorization
76	Invalid request URL to Azure storage
77	Unregistered device on Azure
78	Total number of messages exceeded the IOTHUB quota
79~89	Reserved for Azure

E WebAccess/Cloud & iSensing Error Codes

90	WebSocket connection was unexpectedly aborted.
91	Receive WebSocket disconnection unexpectedly.
92	Fail to establish the WebSocket connection.
93	Fail to send the MQTT CONNECT.
94	Fail to transmit the MQTT SUBSCRIBE.
95	Fail to PUBLISH the connection status.
96	Fail to PUBLISH the configuration information.
97	Fail to PUBLISH the data value.
98	MQTT PUBACK was not received.
99	Internal buffer error.
101	MQTT connection refused, unacceptable protocol version.
102	MQTT connection refused, identifier rejected.
103	MQTT connection refused, Server unavailable.
104	MQTT connection refused, bad user name or password.
105	MQTT connection refused, not authorized.
106~119	Reserved for MQTT

F IFTTT Error Codes

| 120 | Invalid Webhooks IFTTT key |
| 120~139 | Reserved for IFTTT |

G China Telecom Error Codes

140	Device registration failed.
141	Fail to wait server request.
142	Fail to publish the data value.
143~159	Reserved for China Telecom.