PJLink test manual

Change log
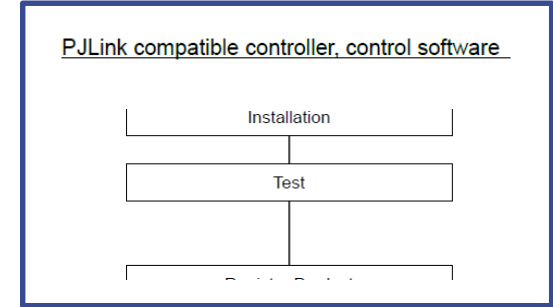
Revision	Change log	Date
1.00	first edition	Mar-16-2018

Contents

1. About this document

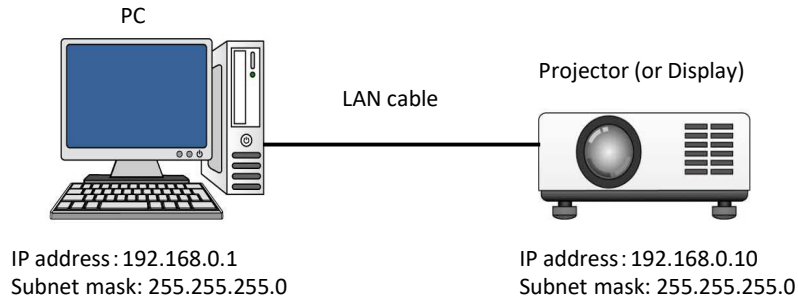PJLink compatible controller, control software

Installation

Test

- This document explains about requisite procedure to execute "Test".

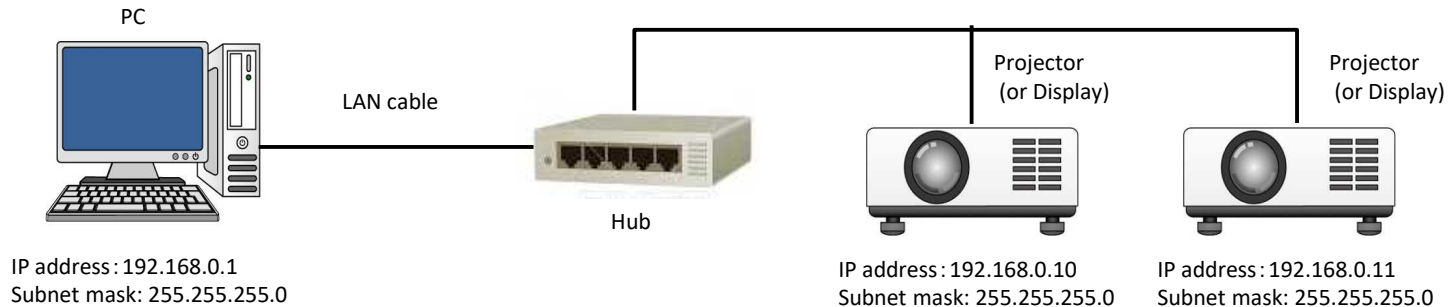- Enter the test results(Pass/Fail) and communication logs in Excel(PJLinkTestSheet.xlsx)

Command functions

	PJLinkTEST4PJ button	Parameter	Command from PJLinkTEST4PJ	Sample replyt	Remark/Projector behavier	Pass/Fail
GET_ALL	-		%1POWR ?	%1POWR=1		Pass
	-		%1INPT ?	%1INPT=14		Pass
	-		%1AVMT ?	%1AVMT=31		Pass
	-		%1ERST ?	%1ERST=000000		Pass
	-		%1LAMP ?	%1LAMP=8253 1 13442 1		Pass
	-		%1INST ?	%1INST=11 22 33 44 1A 2Z 3E		Pass
	-		%1NAME ?	%1NAME=PJLinkProjector		Pass
	-		%1INFO ?	%1INFO=PJLink		Pass
	-		%1INF1 ?	%1INF1=JBMIA		Pass
	-		%1INF2 ?	%1INF2=PJLinkProjector		Pass
	-		%1CLSS ?	%1CLSS=2		Pass
	-		%2INPT ?	%2INPT=14		Pass
	-		%2INST ?	%2INST=11 22 33 44 1A 2Z 3E		Pass
	-		%2SNUM ?	%2SNUM=1234AbcD		Pass

2.1 Environment: Connection diagram

Connection diagram

PC

LAN cable

Projector (or Display)

Note: Set PCs and Projectors/Displays as the same network address.

IP address：192.168.0.1
Subnet mask: 255.255.255.0

IP address：192.168.0.10
Subnet mask: 255.255.255.0

PC

LAN cable

Hub

Projector
(or Display)

Projector
(or Display)

IP address：192.168.0.1
Subnet mask: 255.255.255.0

IP address：192.168.0.10
Subnet mask: 255.255.255.0

IP address：192.168.0.11
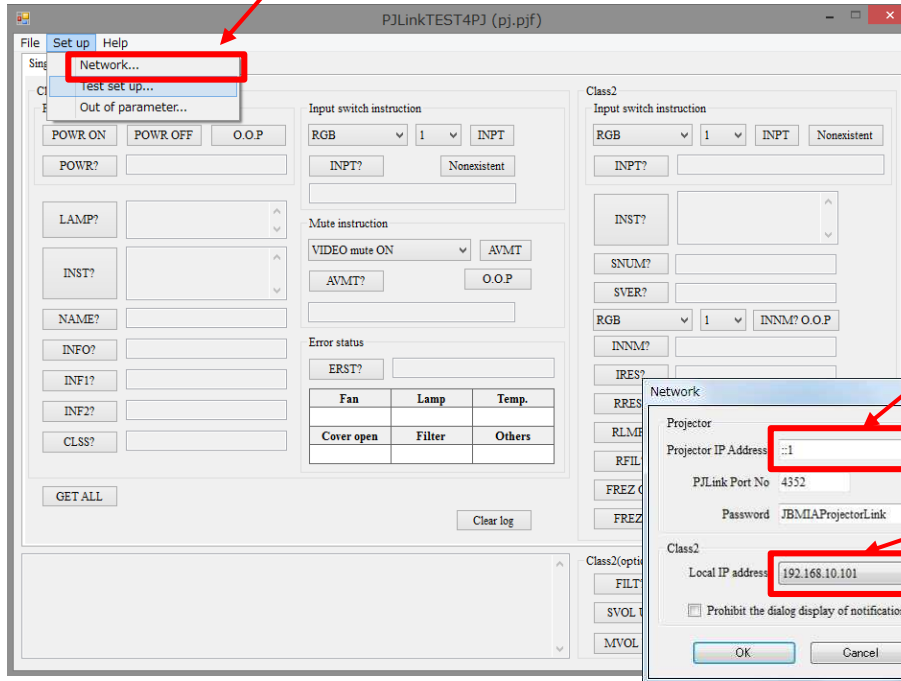Subnet mask: 255.255.255.0

2.1 Tool setup Environment

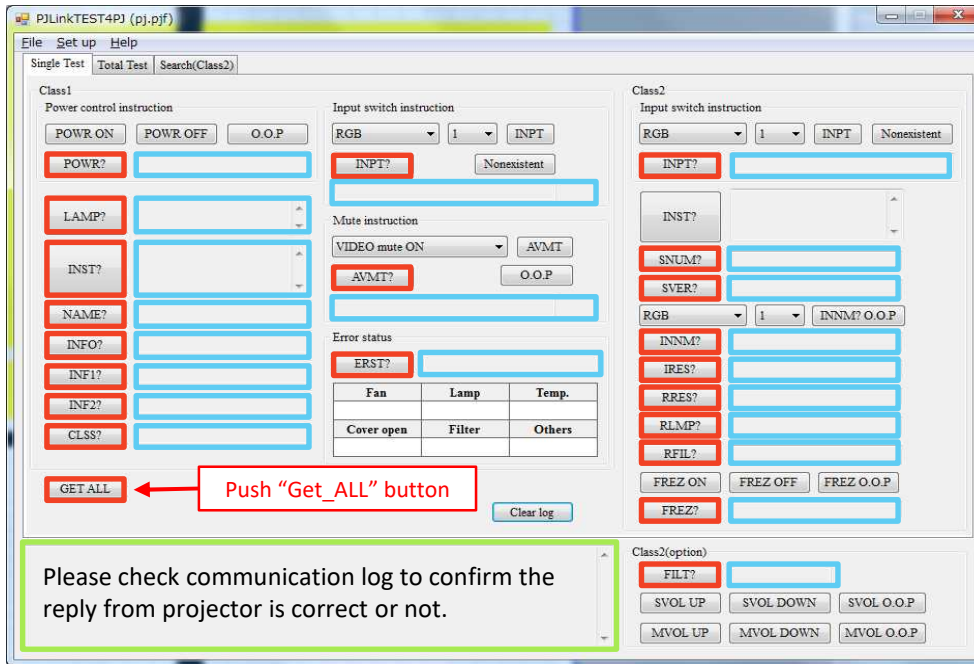
i. Start PJLinkTEST4PJ.exe

PJLinkTEST4PJ.exe

ii. Select Network

i. Start PJLinkTEST4PJ.exe
ii. Press "Set up" tab and select "Network"button.
iii. Input Projector/display's IP address
iv. Select Local IP address for Search and Status Notifications.

iii. Input Projector/display's IP address

iv. Select Local IP address

3.1.1. GET_ALL Get commands

Please confirm all of the query commands work correctly as specified by PJLink specifications.

i. Push "GET_ALL" button.

ii. Confirm each reply and communication log.

iii. If there are any errors or unexpected reply had come, please check the command behavior one by one with each query button.

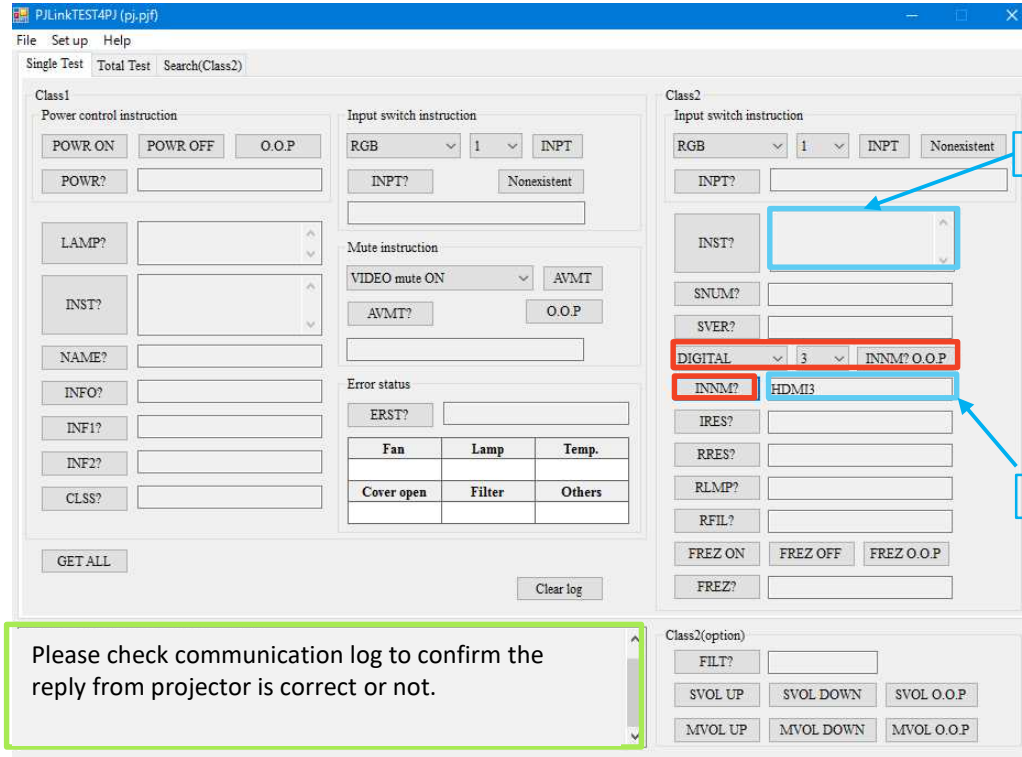# 3.1.2 INNM? Get commands

Input terminal name query (INNM?)

This command has many parameters. It related to the reply of "INST?" Query command.

INNM? command parameter is different in each projector/display. Please confirm the reply of "INST?" query command to know the supported parameter at first.

The reply of "INST?"

e.g.) If the reply of "INST?" is

No.1	11	No.2	12
No.3	31	No.4	32
No.5	51	No.6	52

Then, the following INNM? parameters are available.

RGB 1	RGB 2
DIGITAL 1	DIGITAL 2
NETWORK 1	NETWORK 2

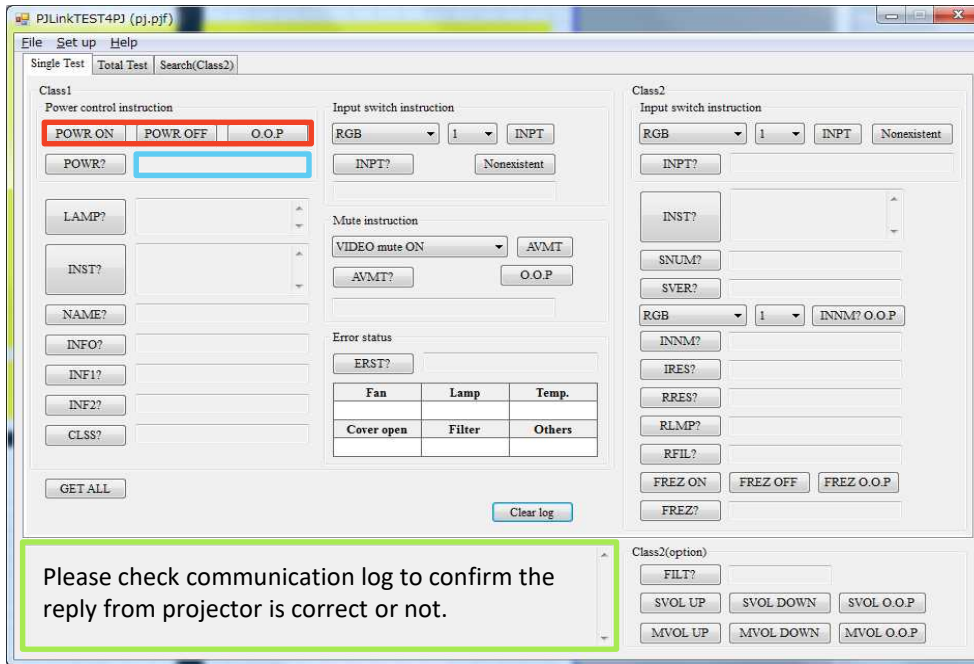* Please refer to "Guidelines for Input Terminals" in details

The reply of "INNM?"

i.   Push "INNM?" button with each parameter your projector/display support.
ii. Confirm the reply from the projector/display is correct by checking communication log.
iii. Push "INNM? O.O.P" button.
iv. Confirm the reply from the projector/display is "ERR2" by checking communication log.

Query button   Reply   Communication log

3.2.1 POWR Set commands

Power control instruction command (POWR)

i. Push POWR ON button.

ii. Confirm the projector turn on correctly.

iii. Confirm the reply from projector/display is correct by checking communication log.

iv. Push POWR OFF button.

v. Confirm the projector/display turn off correctly.

vi. Confirm the reply from projector/display is correct by checking communication log.

vii. Push O.O.P button

viii. Confirm the projector/display do nothing.

ix. Confirm the reply from projector/display is "ERR2" by checking communication log.

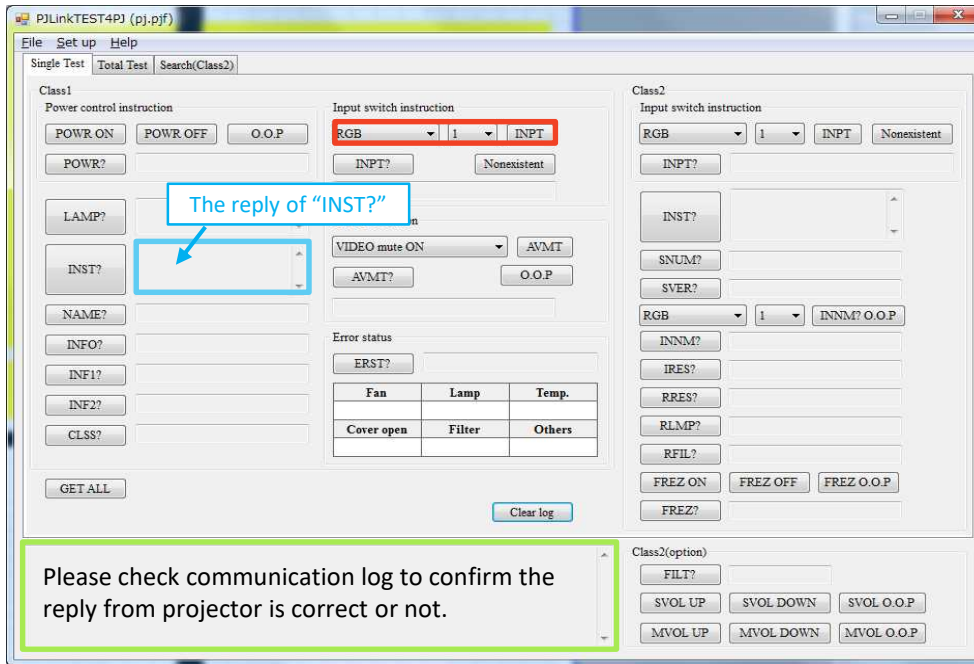▭ Instruction button   ▭ Reply   ▭ Communication log

3.2.2. INPT(CLASS1) Set commands

Input switch instruction command (INPT)

This command has many parameters. It related to the reply of "INST?" Query command.

The reply of "INST?"

Please check communication log to confirm the reply from projector is correct or not.

Instruction button   Reply   Communication log

INPT command parameter is different in each projector/display. Please confirm the reply of "INST?" query command to know the supported parameter at first.

e.g.) If the reply of "INST?" is

No.1	11	No.2	12
No.3	31	No.4	32
No.5	51	No.6	52

Then, the following INPT parameters are available.

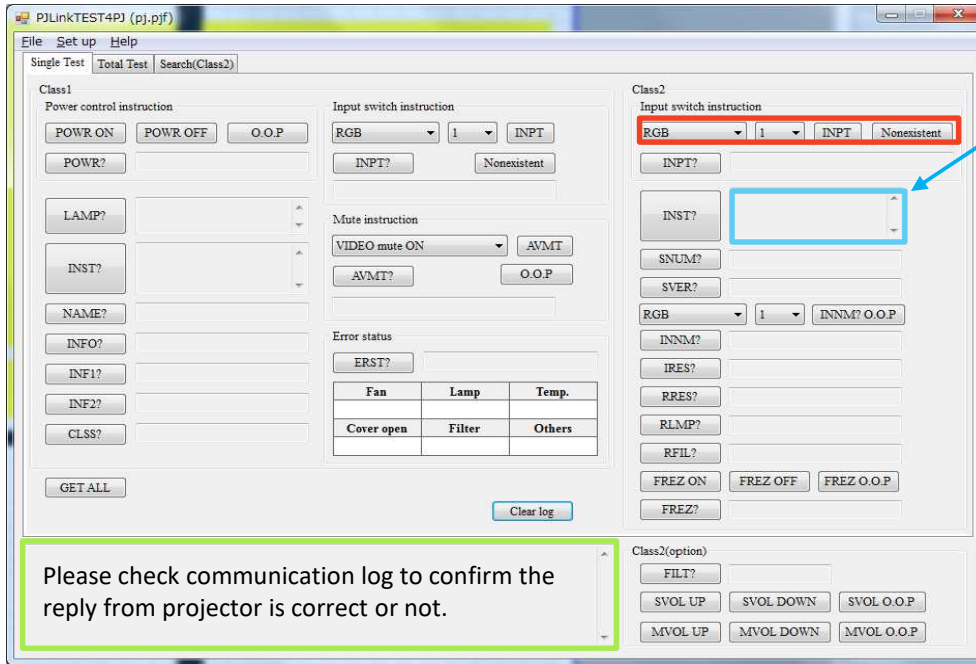| RGB 1 | RGB 1 |
| DIGITAL 1 | DIGITAL 2 |
| NETWORK 1 | NETWORK 2 |

* Please refer to "Guidelines for Input Terminals" in details

i.   Push "INPT" button with each parameter your projector/display support.

ii.   Confirm the reply from the projector/display is correct by checking communication log.

iii.   Push "Nonexistent" button

iv.   Confirm the reply from the projector/display is "ERR2" by checking communication log.

3.2.3. INPT(CLASS2) Set commands

Input switch instruction command (INPT)

This command has many parameters. It related to the reply of "INST?" Query command.

Please check communication log to confirm the reply from projector is correct or not.

Instruction button   Reply   Communication log

The reply of "INST?"

INPT command parameter is different in each projector/display. Please confirm the reply of "INST?" query command to know the supported parameter at first.

e.g.) If the reply of "INST?" is

No.1	11	No.2	12
No.3	31	No.4	32
No.5	51	No.6	52

Then, the following INPT parameters are available.

RGB 1	RGB 2
DIGITAL 1	DIGITAL 2
NETWORK 1	NETWORK 2

* Please refer to "Guidelines for Input Terminals" in details

i. Push "INPT" button with each parameter your projector/display support.

ii. Confirm the reply from the projector/display is correct by checking communication log.

iii. Push "Nonexistent" button.

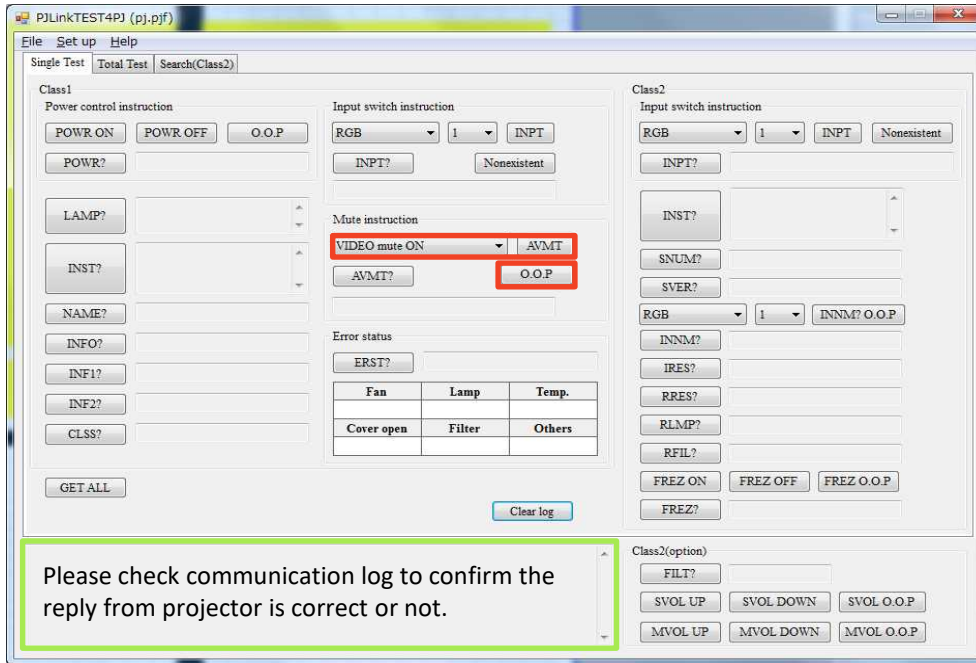iv. Confirm the reply from the projector/display is "ERR2" by checking communication log.

3.2.4. AVMT Set commands

Mute instruction command (AVMT)

This command has 6 parameters. Not all parameters are supported.

Instruction button   Reply   Communication log

This command has following parameters.

- Video mute ON
- Video mute OFF
- Audio mute ON
- Audio mute OFF
- Video and Audio mute ON
- Video and Audio mute OFF

Supported parameters depends on the projector/display.
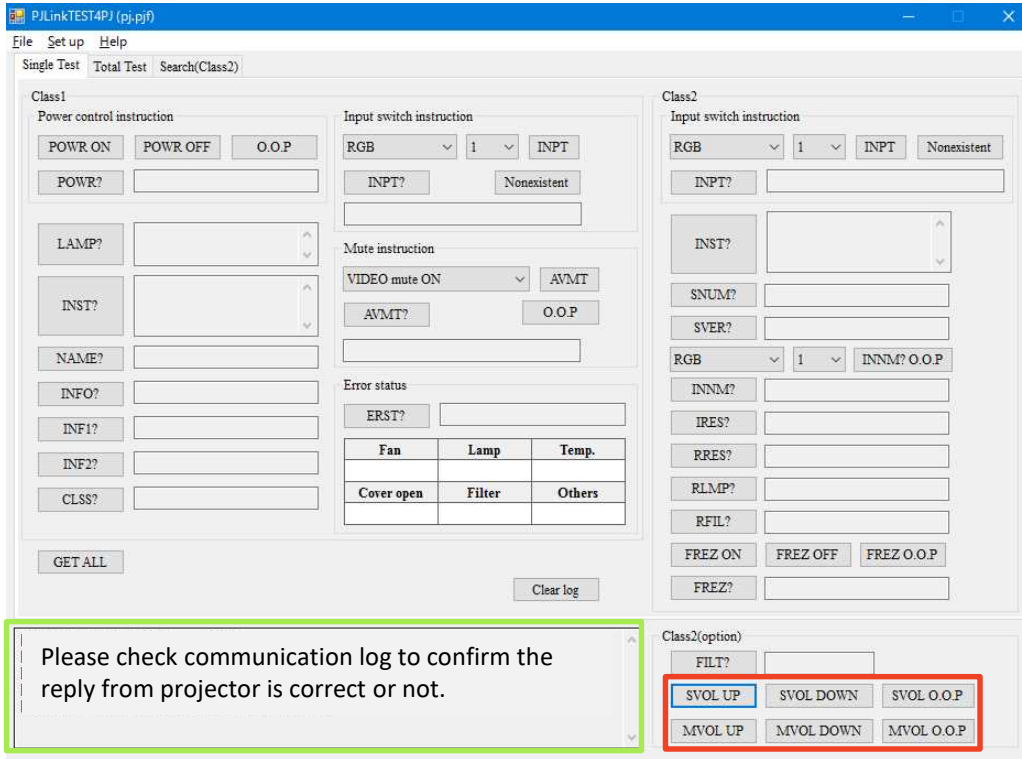
If the projector/display doesn't support the parameter,

The projector shall reply "ERR2".

i. Push AVMT button with each parameter. (total 6 trial)

ii. Confirm the reply from projector/display is correct by checking communication log.

3.2.5 SVOL/MVOL Set commands

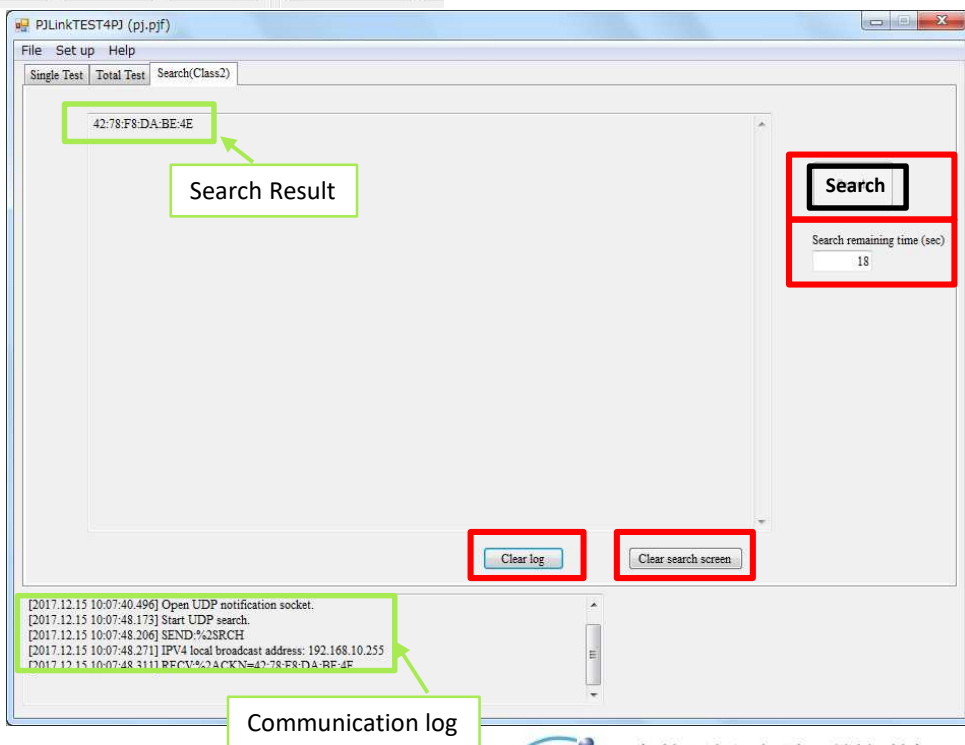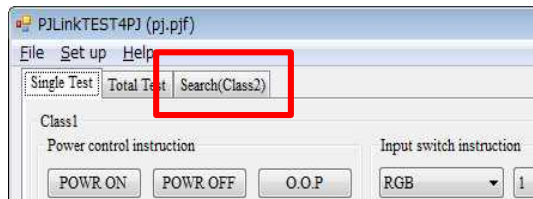Speaker/Microphone volume adjustment command (SVOL/MVOL)

Instruction button   Reply   Communication log

i.   Push "SVOL UP" button.
ii.   Confirm the reply from the projector/display is correct by checking communication log.
iii.   Push "SVOL DOWN" button.
iv.   Confirm the reply from the projector/display is correct by checking communication log.
v.   Push SVOL O.O.P button.
vi.   Confirm the reply from the projector/display is "ERR2" by checking communication log.

vii.   Push "MVOL UP" button.
viii.   Confirm the reply from the projector/display is correct by checking communication log.
ix.   Push "MVOL DOWN" button.
x.   Confirm the reply from the projector/display is correct by checking communication log.
xi.   Push MVOL O.O.P button.
xii.   Confirm the reply from the projector/display is "ERR2" by checking communication log.

If the projector/display doesn't support Speaker or Microphone, the projector/display shall reply "ERR1".
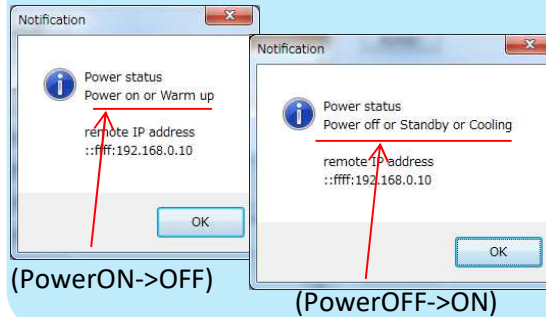
4. Search function

i. Push Search(CLASS2) button.
ii. It changes to Search function mode.

iii. Push search button.
iv. Search function starts.
v. Results are indicated by MAC address.
vi. Search doesn't restart
  until Search remaining time is zero.

vii. Push Clear log button.
viii. It clears the communication log.

ix. Push Clear search screen button.
x. It clears the search results.

5. Status Notification function

i-1. [Link Up]

i-2. [Power]

(PowerON->OFF)

(PowerOFF->ON)

i-3. [Error status]

(Error occurred)

(No Error occurred)

i-4. [Input change end]

Confirm the following notifications displayed on your computer screen

i-1. [Link Up]
 Connects the projector/display to the network.
i-2. [Power]
 Switches projector/display's power status.
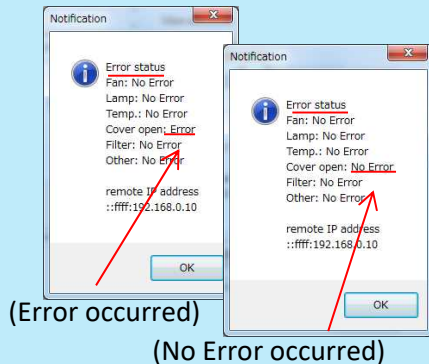 (ON ->OFF / OFF -> ON)
i-3. [Error status]
 Switches projector/display's error status.
 (Error -> No error / No Error -> Error)
     Example: Open the projector/display's cover to
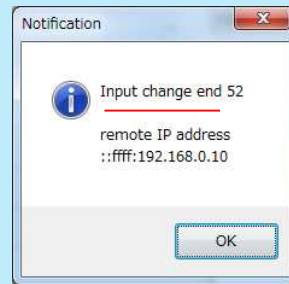   cause the cover open error.
i-4. [Input change end]
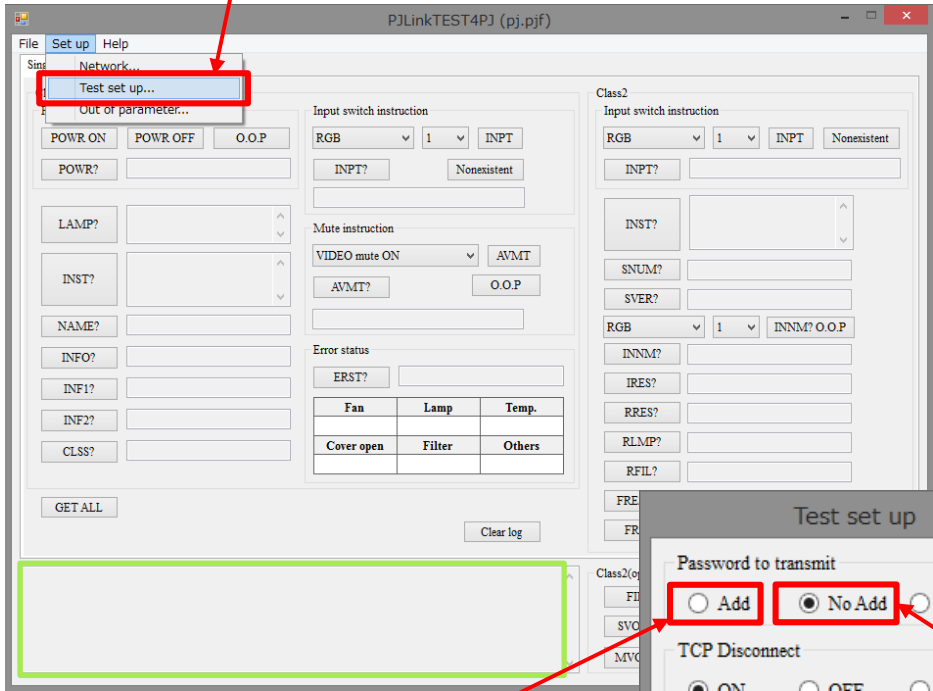 Changes the projector/display's input source.

6. Authentication function

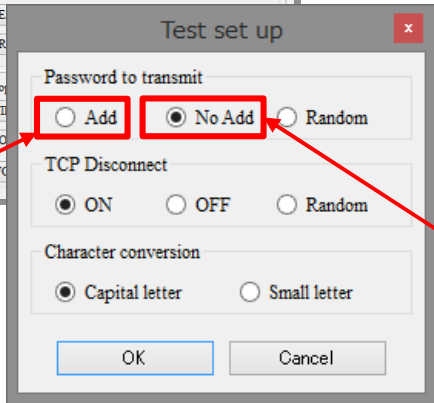i. Select Test set up… of PC Application

ii. Password to transmit set to Add
   ii-1 Match with the projector/display 's password
   ii-2 Mismatch with the projector/display 's password

iii. Password to transmit set to NoAdd
   iii-1 Match with the projector/display 's password
   iii-2 Mismatch with the projector/display 's password