

MMI – Software - Chaban

- Man Machine Interface – Chaban

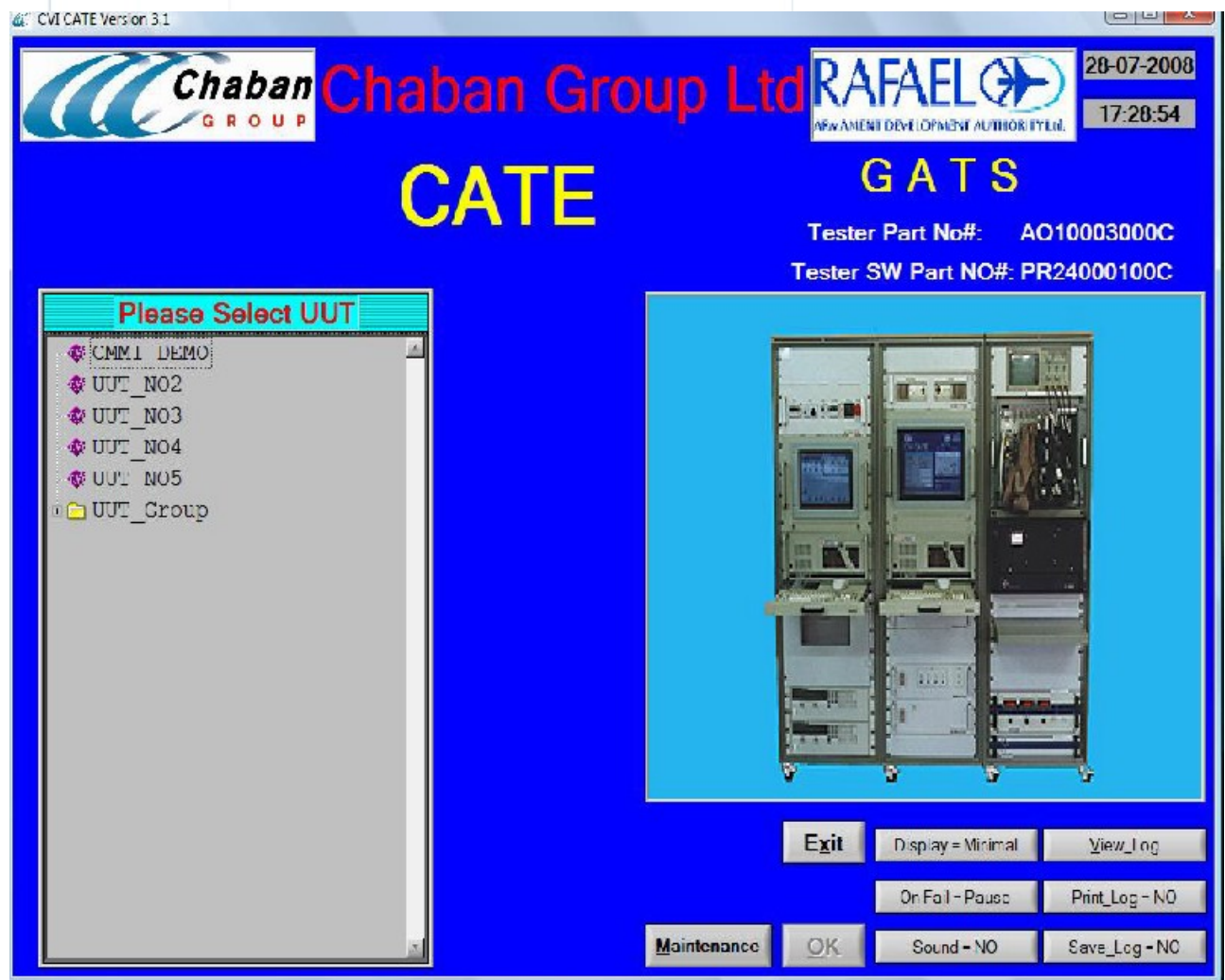
Chaban ATE MMI is an operating system design for management of all testing environment of the automatic test equipment.

The MMI was developed in Lab Windows CVI environment.

The MMI can provide a fully testing & controlling environment for develop of products and testing it.

The MMI supports permissions for each user.

Here are some exemplars of the MMI.



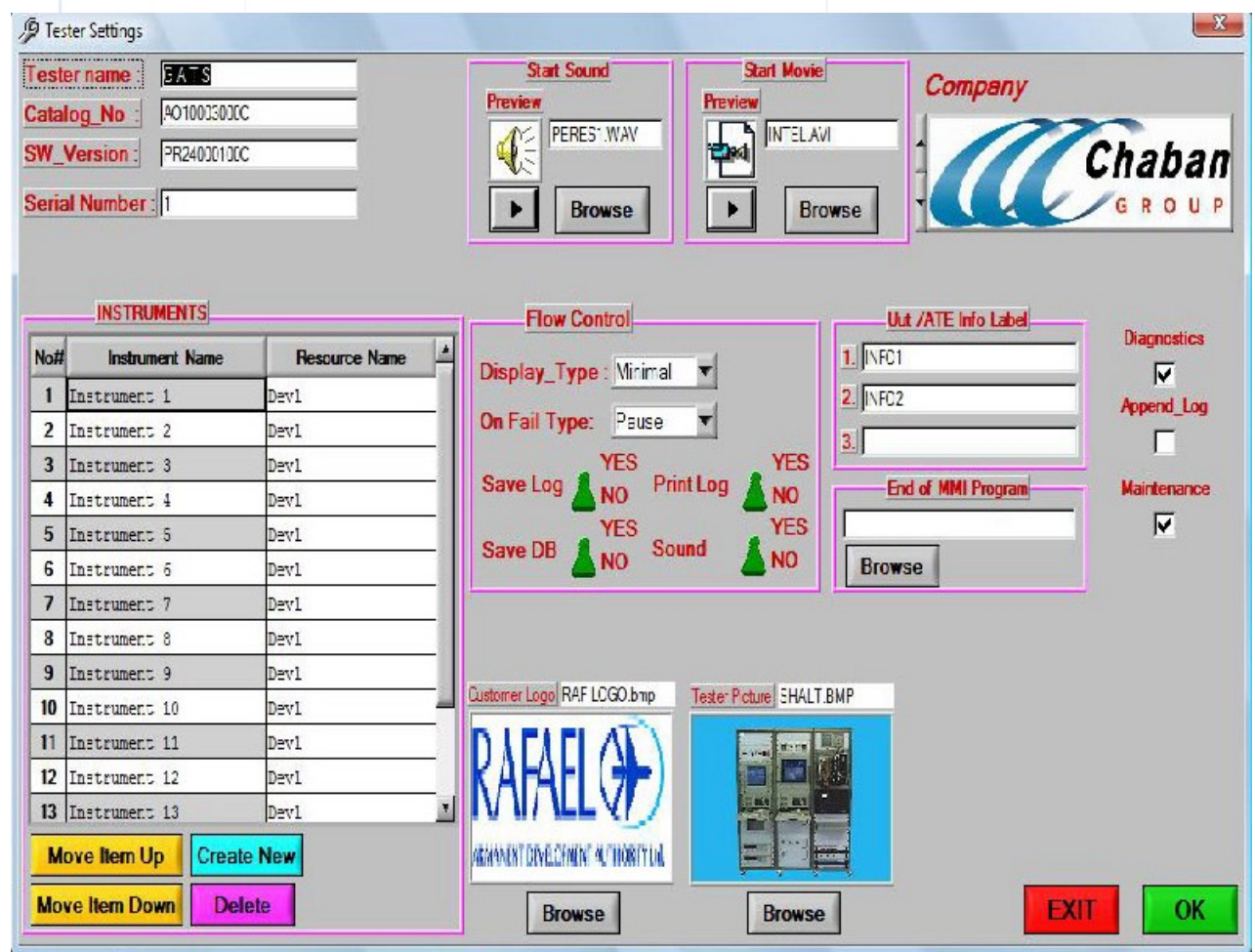
Example for the main opening screen

ATE Maintenance:

The operator can adjust externally (without involving a programmer) the following settings:

1. Entering the ATE name – shown on main screen and log file.
2. Entering ATE part number.
3. Entering software version.
4. Entering ATE serial number.
5. Selection of the picture in self-test mode.
6. Selecting the instruments for POWER ON BIT.
7. Adjusting the start positions of the control buttons(FLOW control).
8. Entering Start movie & sound when opening.
9. Entering customer logo.

Note: authorize user access only.



Tester Settings

Tester name: EAT-S
 Catalog_No: A0100300CC
 SW_Version: PR24000100C
 Serial Number: 1

Start Sound
 Preview: PERES.WAV
 Browse

Start Movie
 Preview: INTELAVI
 Browse

Company
 Chaban GROUP

No#	Instrument Name	Resource Name
1	Instrument 1	Dev1
2	Instrument 2	Dev1
3	Instrument 3	Dev1
4	Instrument 4	Dev1
5	Instrument 5	Dev1
6	Instrument 6	Dev1
7	Instrument 7	Dev1
8	Instrument 8	Dev1
9	Instrument 9	Dev1
10	Instrument 10	Dev1
11	Instrument 11	Dev1
12	Instrument 12	Dev1
13	Instrument 13	Dev1

Flow Control
 Display_Type: Minimal
 On Fail Type: Pause
 Save Log: YES
 Print Log: YES
 Save DB: YES
 Sound: YES

Unit /ATE Info Label
 1: INFC1
 2: INFC2
 3:
 End of MMI Program:
 Browse

Customer Logo RAF LOGO.bmp
Tester Picture SHALT.BMP
 Browse

Diagnostics
 Append_Log: ☒
Maintenance
☒

Move Item Up Create New
 Move Item Down Delete

EXIT OK

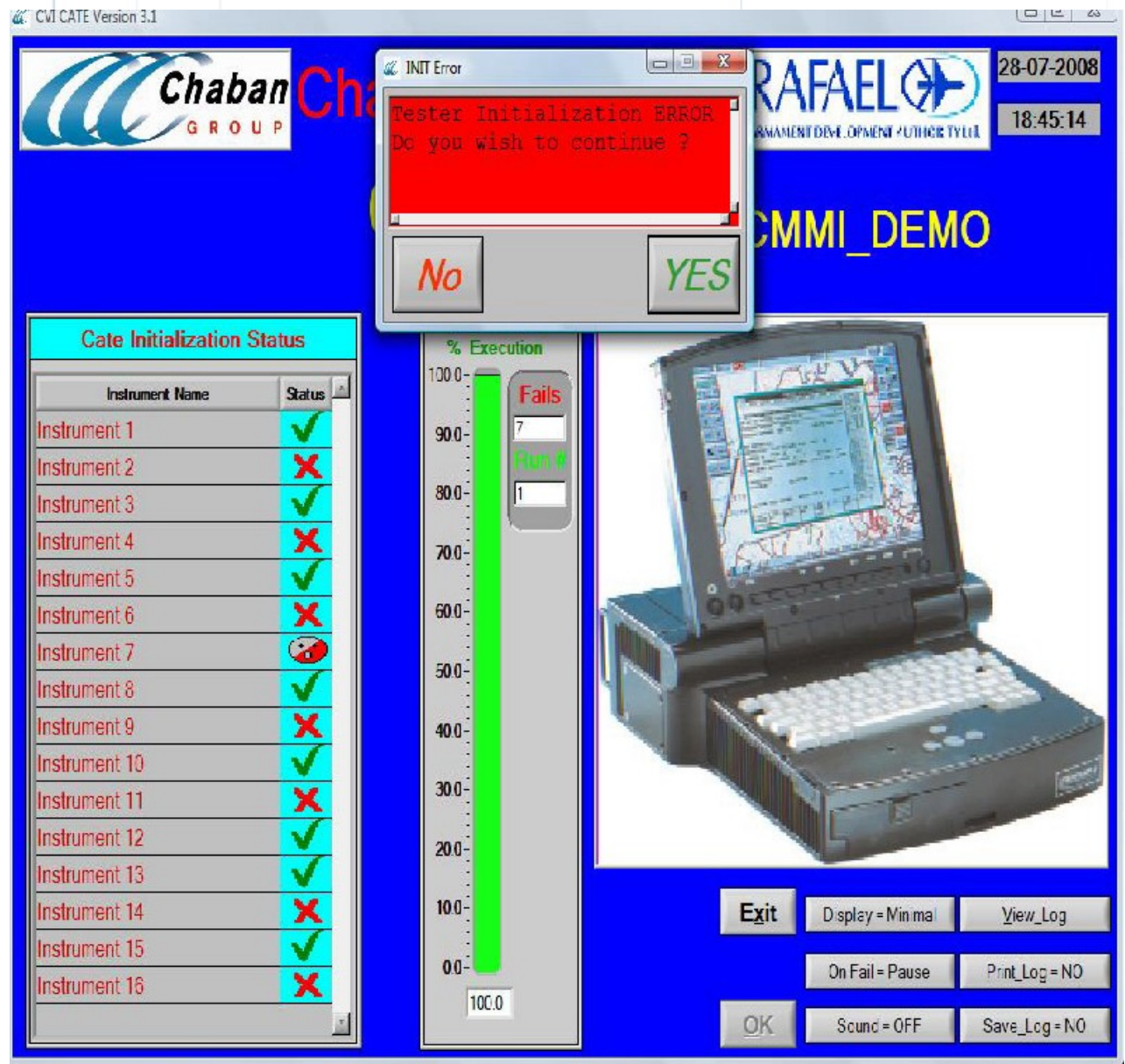
Example for ATE setting screen

Initialization screen:

The MMI starts the execution of the selected test by starting a POWER ON BIT procedure.

Component that Pass the test is mark as V , Fail mark as X.

In case of fail the operator decide to continue or stop the execution.



The screenshot displays the CWI CATE Version 3.1 software interface. At the top, there is a header with the Chaban GROUP logo and the text "RAFAEL" and "ARMAMENT DEVELOPMENT AUTHORITY". The date "28-07-2008" and time "18:45:14" are shown in the top right corner. The main title "MMI_DEMO" is prominently displayed.

A central dialog box titled "INIT Error" is open, displaying the message: "Tester Initialization ERROR Do you wish to continue ?". It has two buttons: "No" and "YES".

Below the dialog box, there is a section titled "Cate Initialization Status" which contains a table with 16 instruments. The status of each instrument is indicated by a green checkmark (V) for pass and a red X for fail.

Instrument Name	Status
Instrument 1	✓
Instrument 2	✗
Instrument 3	✓
Instrument 4	✗
Instrument 5	✓
Instrument 6	✗
Instrument 7	✗
Instrument 8	✓
Instrument 9	✗
Instrument 10	✓
Instrument 11	✗
Instrument 12	✓
Instrument 13	✓
Instrument 14	✗
Instrument 15	✓
Instrument 16	✗

To the right of the table is a vertical bar graph labeled "% Execution" ranging from 0.0 to 100.0. The bar is green and reaches the 100.0 mark. Below the bar, there is a "Fails" counter showing "7" and a "Run #" counter showing "1".

On the right side of the interface, there is an image of a handheld electronic device (PDA) displaying a test results screen. Below the image, there are several control buttons: "Exit", "Display = Min mal", "View_Log", "On Fail = Pause", "Print_Log = NO", "OK", "Sound = OFF", and "Save_Log = NO".

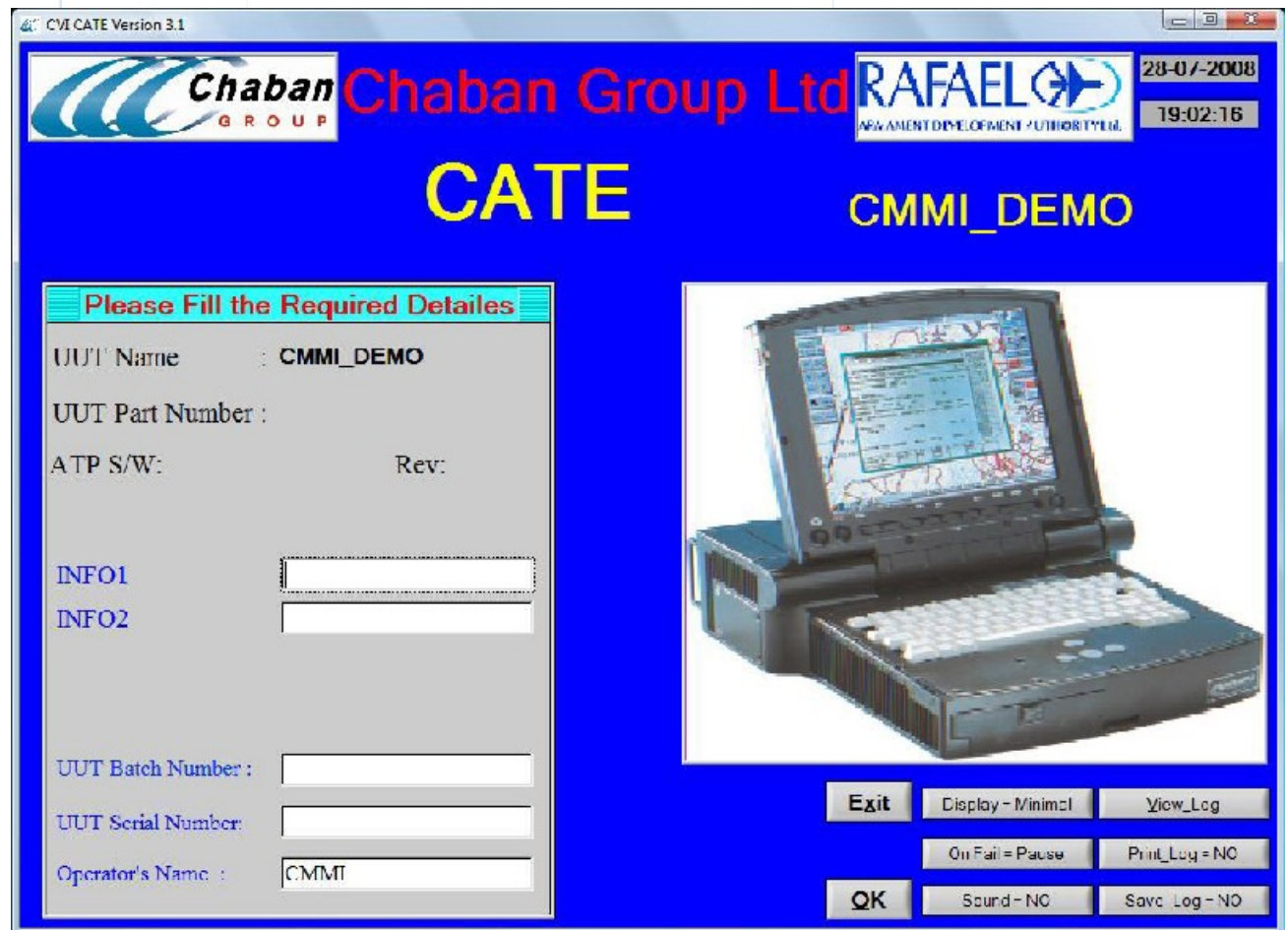
Example for ATE POWER ON BIT screen with Fail

USER INFO & Unit Under Test INFO:

The operator may add the following info to the UUT setting :

1. Entering the UUT batch Number - shown in the log file.
2. Entering the UUT serial number – shown in the log file.
3. Entering operator name – shown in the log file.
4. Entering additional info (INFO1, INFO2).

Note: INFO1, INFO2 is an example for information regarding to the UUT.
(UUT is Unit Under Test)



CVI CATE Version 3.1

Chaban Group Ltd **RAFAEL** 28-07-2008 19:02:16

CATE **CMMI_DEMO**

Please Fill the Required Details

UUT Name : CMMI_DEMO

UUT Part Number :

ATP S/W: Rev:

INFO1

INFO2

UUT Batch Number :

UUT Serial Number:

Operator's Name : CMMI

Exit Display - Minimal View_Log

On Fail = Pause Print_Log = NO

OK Sound = NO Save_Log = NO

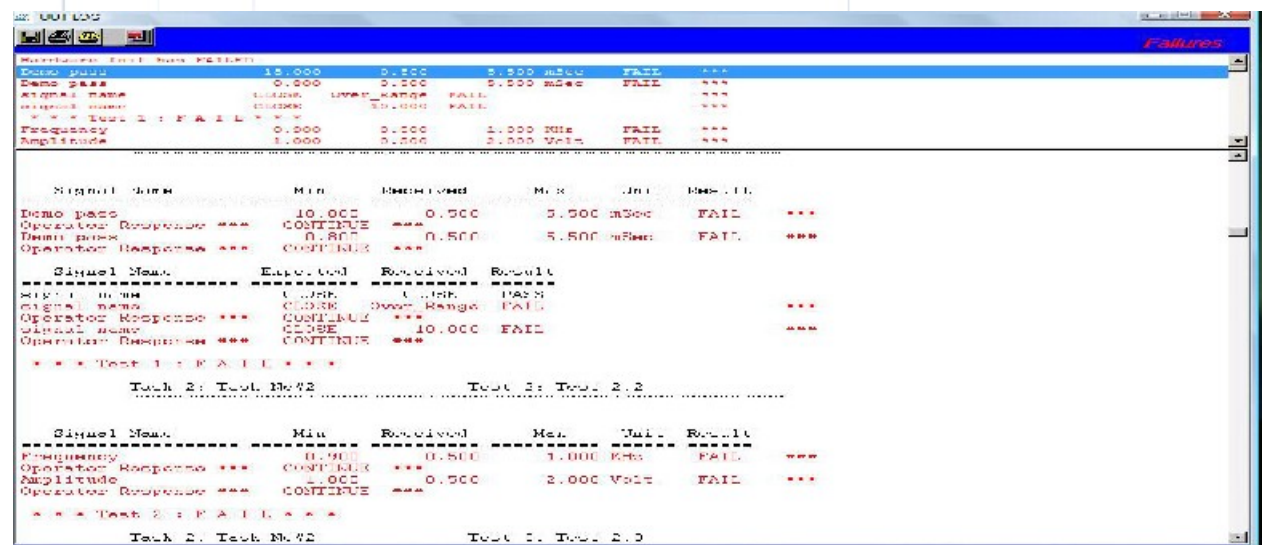
Example for USER & UUT information screen

LOG FILE:

All tests results & operator response for events are saved in the log file in each run of the program.


Log files are saved as:

1. Simple text file, name and folder set by the operator.
2. Access file for data base analysis, name and folder set by the operator.
3. HTML file, name and folder set by the operator.



Signal Name	Min	Received	Max	Unit	Result
Demo pass	10.000	0.500	5.500 mSec		FAIL ***
Operator Response ***	CONTINUE				***
Demo pass	0.500	0.500	5.500 mSec		FAIL ***
Operator Response ***	CONTINUE				***
*** Test 1 : F A I L ***					
Frequency	0.500	0.500	1.000 KHz		FAIL ***
Amplitude	0.500	0.500	2.000 Volt		FAIL ***
Task 2: Task No#2					
Signal Name	Min	Received	Max	Unit	Result
Demo pass	10.000	0.500	5.500 mSec		FAIL ***
Operator Response ***	CONTINUE				***
Demo pass	0.500	0.500	5.500 mSec		FAIL ***
Operator Response ***	CONTINUE				***
*** Test 1 : F A I L ***					
Task 2: Task No#2					
Signal Name	Min	Received	Max	Unit	Result
Frequency	0.500	0.500	1.000 KHz		FAIL ***
Operator Response ***	CONTINUE				***
Amplitude	0.500	0.500	2.000 Volt		FAIL ***
Operator Response ***	CONTINUE				***
*** Test 2 : F A I L ***					
Task 2: Task No#2					

Example of a log file in Text mode



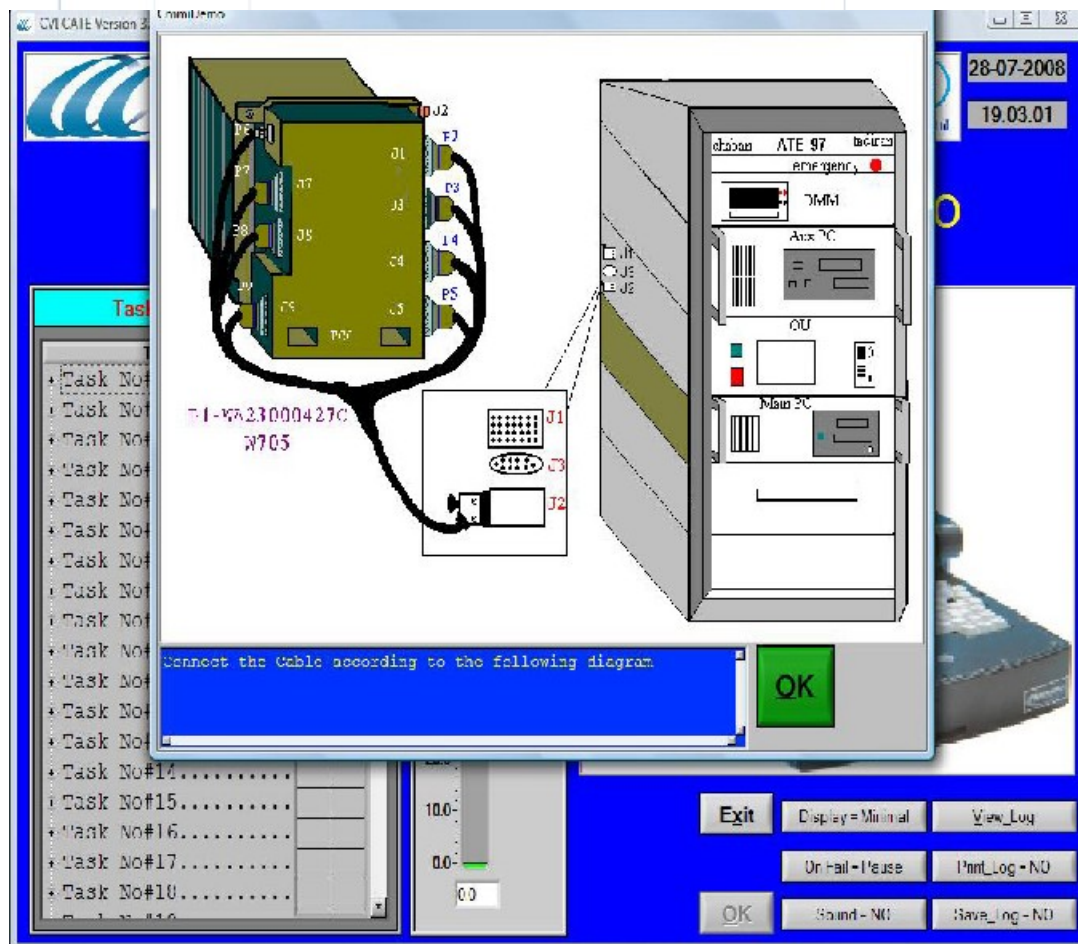
Signal Name	Min	Received	Max	Unit	Result
Test 1.00	1.000	10.000	10.000 mSec		PASS
*** Test 2 : P A S S ***					
Task 1: Task No#1					
Task 2: Task No#2					
Task 3: Task No#3					
Signal Name	Min	Received	Max	Unit	Result
Demo pass	10.000	0.500	5.500 mSec		FAIL ***
Operator Response ***	CONTINUE				***
Demo pass	0.500	0.500	5.500 mSec		FAIL ***
Operator Response ***	CONTINUE				***
*** Test 1 : F A I L ***					
Task 2: Task No#2					
Signal Name	Min	Received	Max	Unit	Result
Demo pass	10.000	0.500	5.500 mSec		FAIL ***
Operator Response ***	CONTINUE				***
Demo pass	0.500	0.500	5.500 mSec		FAIL ***
Operator Response ***	CONTINUE				***
*** Test 2 : F A I L ***					
Task 2: Task No#2					

Example of a log file in HTML mode

INSTRUCTIONS TO THE OPERATOR:

The instructions for the operator is shown to the operator in several ways:

1. Window with simple text.
2. Window with a picture (BMP file).
3. Window shown a movie (AVI file).

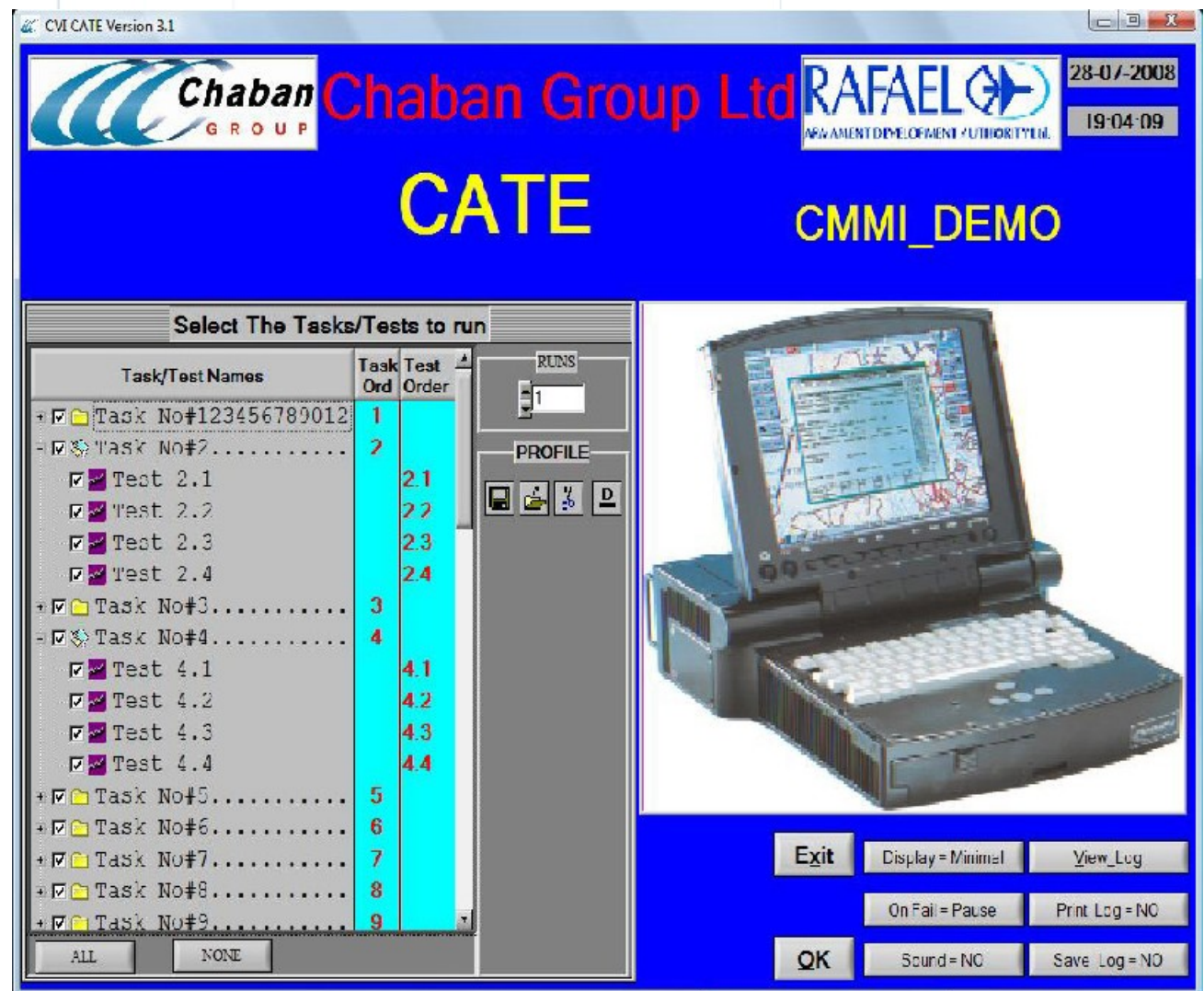


Example for instruction the operator screen

EXECUTION MENU:

The execution menu is the screen where the operator chooses the test for execute.

1. Simple graphic selection of Task & Test and the order of running.
2. The ATP will be fully automatic or semi automatic.
3. Setting the display type of the log file.
4. Sound on/off.
5. Print log automatic no/off.
6. On fail option: pause, force running, halt.
7. Save log automatic to Data base.



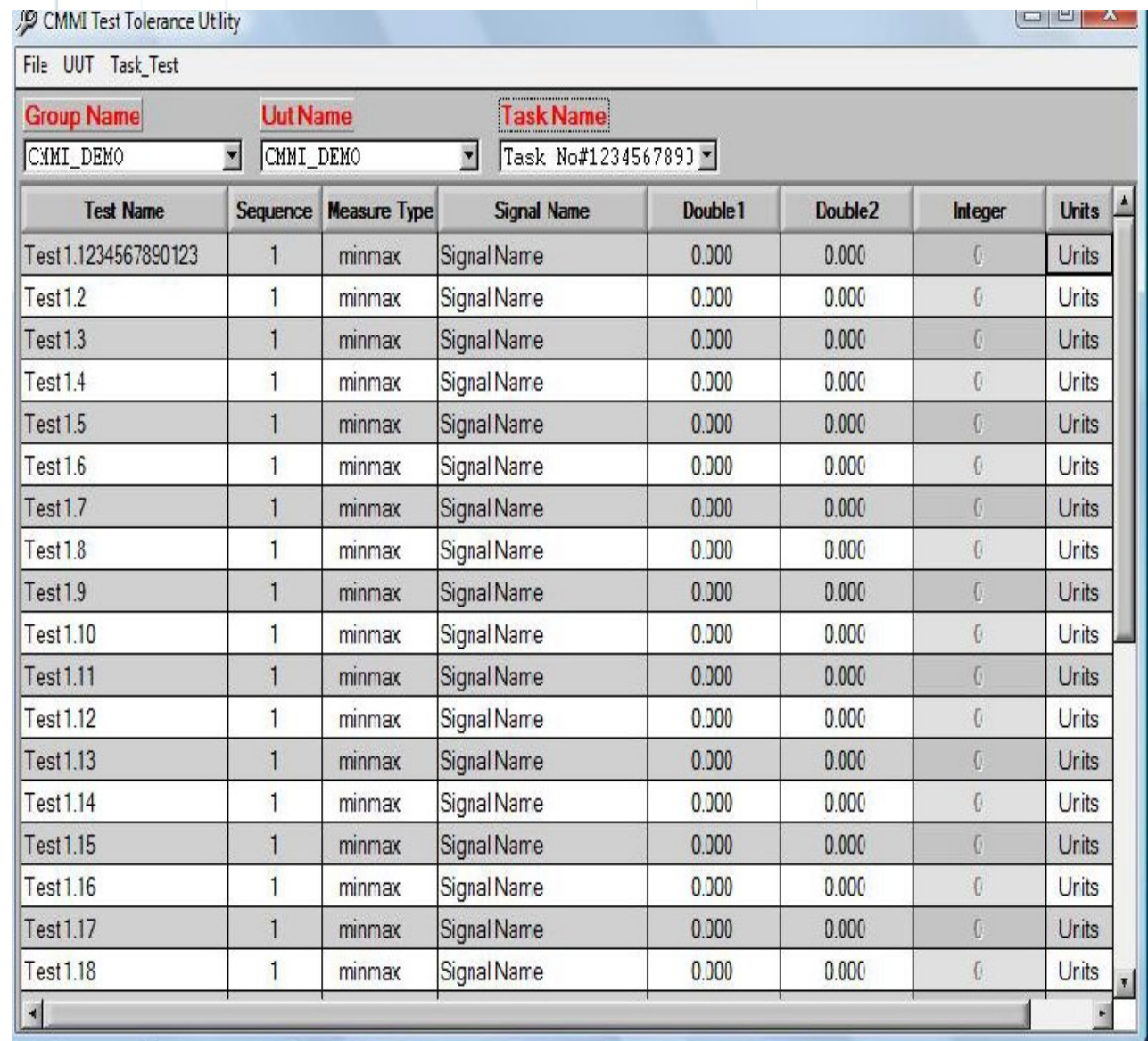
Example for Execution screen

Unit Under Test TOLERANCE:

The operator can determine the Test tolerances by access to the tests tolerances screen.

The access to the test tolerances is simple and store in a database. Changes in the test tolerance do not need any compilation of the program.

Note: authorize user access only.



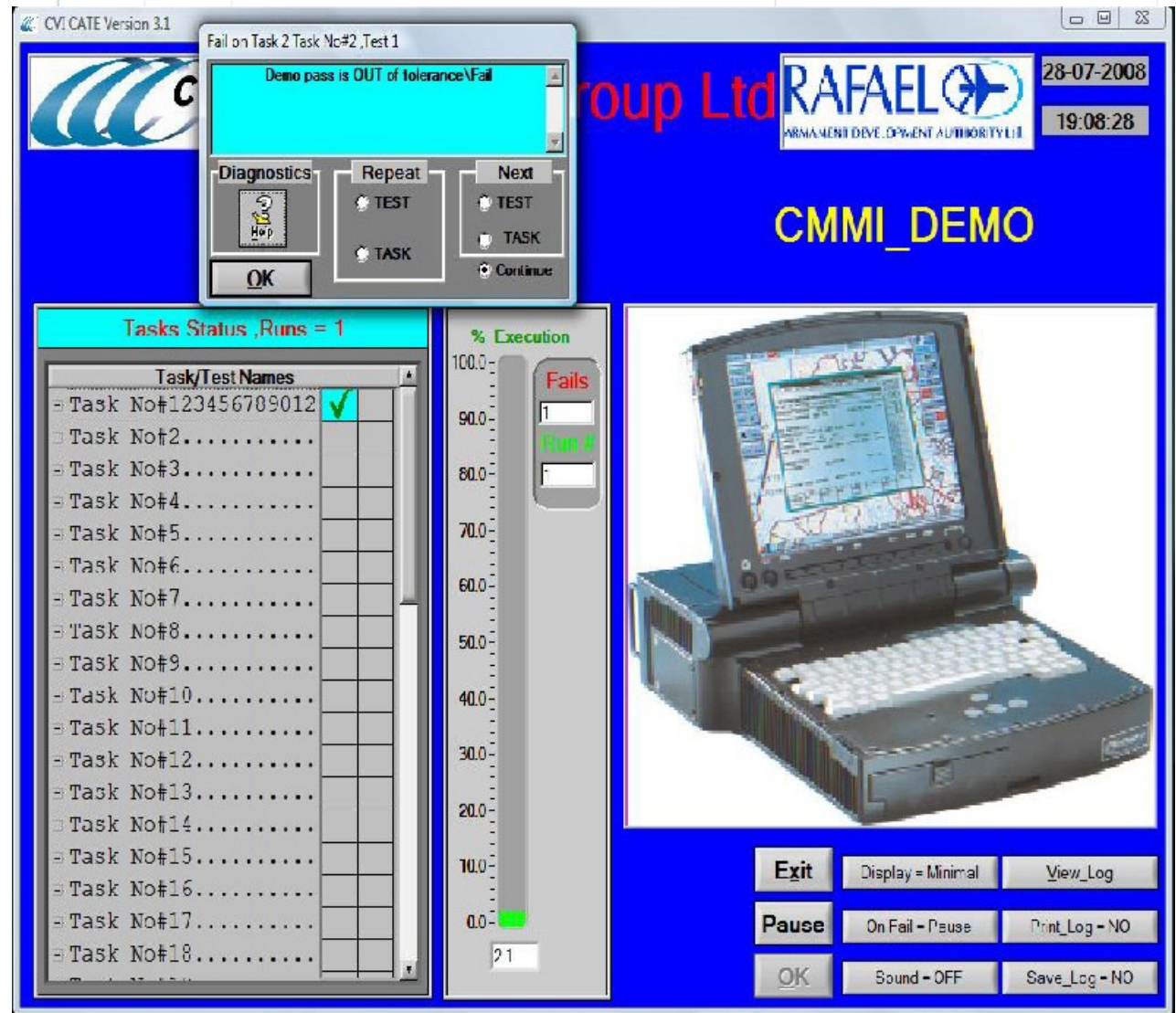
Test Name	Sequence	Measure Type	Signal Name	Double1	Double2	Integer	Units
Test 1.1234567890123	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.2	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.3	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.4	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.5	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.6	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.7	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.8	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.9	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.10	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.11	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.12	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.13	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.14	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.15	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.16	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.17	1	minmax	Signal Name	0.000	0.000	0	Units
Test 1.18	1	minmax	Signal Name	0.000	0.000	0	Units

Example for test tolerance screen

Fail management:

In case of fail the operator is asking to choose the way to continue.

The operator response will be written in the log file.



Example for Fail screen

Please contact us for more information or order a Demo CD.

We will be happy to assist with any query or request, **The Chaban Group**.
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