

CIVIL ENGINEERING ELEMENTAL COST ANALYSIS (CEECA)

**KAEDAH MEMASUKKAN DATA KE DALAM
SISTEM MELALUI PWCIC**

Dua (2) workflow;

- i- Data originated from ATDA Module
- ii- Historical Data (CEECA Only)

Dua (2) sub workflow;

- i- Dari Pejabat 'HODT'
- ii- Dari Pejabat 'S.O.'

System Log in

url – pwcic.jkr.gov.my

user log in

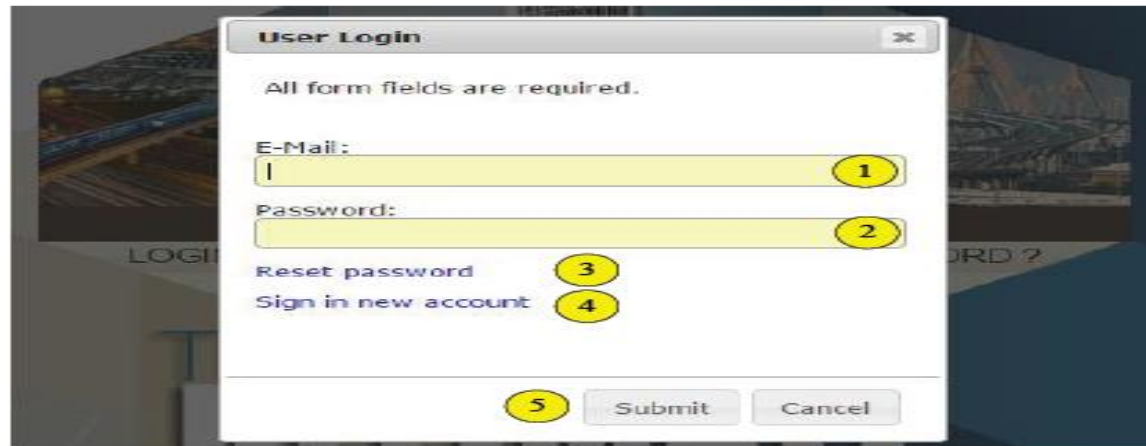
2 SYSTEM LOGIN

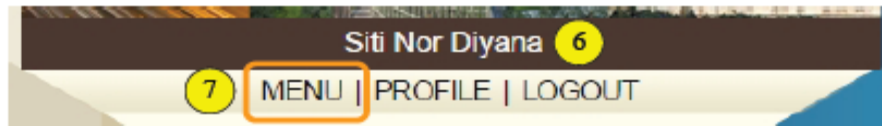
2.1 USER LOGIN

Registered user may login from portal front page. Click on 'LOGIN' menu bar.



2.2 LOGIN PAGE

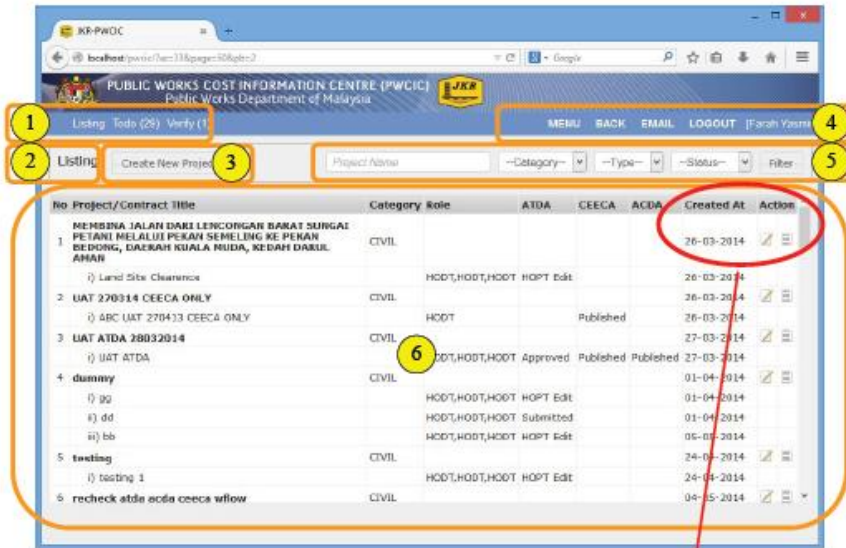
A screenshot of a 'User Login' dialog box. The dialog has a title bar with 'User Login' and a close button. Inside, it says 'All form fields are required.' Below this are two input fields: 'E-Mail:' and 'Password:'. The 'E-Mail' field has a yellow circle with the number '1' at its end. The 'Password' field has a yellow circle with the number '2' at its end. Below the input fields are two links: 'Reset password' with a yellow circle '3' and 'Sign in new account' with a yellow circle '4'. At the bottom of the dialog are two buttons: 'Submit' and 'Cancel'. A yellow circle with the number '5' is positioned to the left of the 'Submit' button.



Once login is successful, user name will appear on top of login bar.
Click on 'MENU' to enter project menu.



1. Back to portal page.
2. Open build-up rate project.
3. Open ATDA, CEECA, ACDA project.
4. System internal notification email.



Create New Project

3.2.2 Create New Project

To create new project click on 'Create New Project' button.

Project

Project Title: [1]

Client: [2] -- SELECT --

Work Category: [3] CIVIL

Project Category: [4] SELECT --

Preparation Type: [5] SELECT --

State: [6] -- Select --

City: [7]

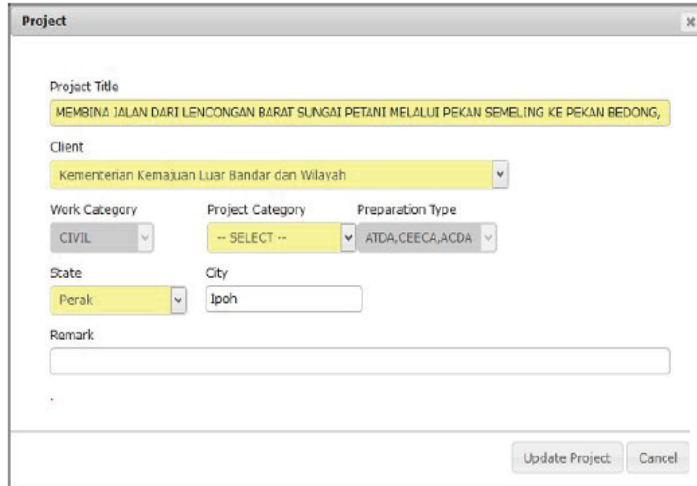
Remark: [8]

[9] Create Project Cancel

1. Project Information Menu.
2. Project Information Title.
3. Button to create new project.
4. Page Navigation Menu.
5. Project Filtering Menu.
6. Project/Contract Information.
7. Edit project information.
8. Open project(contract) details (ATDA,CEECA,ACDA).

3.2.3 Edit Existing Project

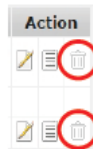
To edit existing project, click on project edit icon .



To execute update process, click on button 'Update Project'

3.2.4 Delete Existing Project

When office contact person login into the system, delete icon will appear for the project deletion. Only an empty project can be deleted by office contact person. This rules is also applied to project contract deletion.



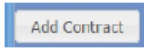
3.2.6 Project/Contract Information

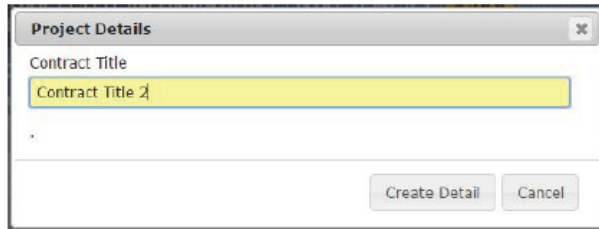
No	Project/Contract Title	Category	Role	ATDA	CEECA	ACDA	Created At	Action
1	MEMBINA JALAN DARI LENCONGAN BARAT SUNGAI PETANI MELALUT PEKAN SEMELING KE PEKAN BEDONG, DAERAH KUALA MUDA, KEDAH	CIVIL					26-03-2014	 
2	1) Land Site Clearance		HODT,HODT,HODT	HOPT Edit			26-03-2014	
2	UAT 270314 CEECA ONLY	CIVIL					26-03-2014	 
	1) ABC UAT 270413 CEECA ONLY		HODT		Published		26-03-2014	
3	UAT ATDA 28032014	CIVIL					27-03-2014	 
	1) UAT ATDA		HODT,HODT,HODT	Approved	Published	Published	27-03-2014	

- Project Title highlighted in bold text.
- Contract Title highlighted in normal text.
- Project category - 'BUILDING' or 'CIVIL'.
- Your office role for current contract.
- Show contract work flow status.
Work Flow Status:
1.HOPT Edit, 2.User Edit, 3.Submitted, 4.Approved, 5.Published.
- Project or contract created date.
- Project Action:
Click on icon  to edit project information.
Click on icon  to open project contract details.

Edit/Delete

3.3.1.4 Add New Contract

To add new contract, click on button 

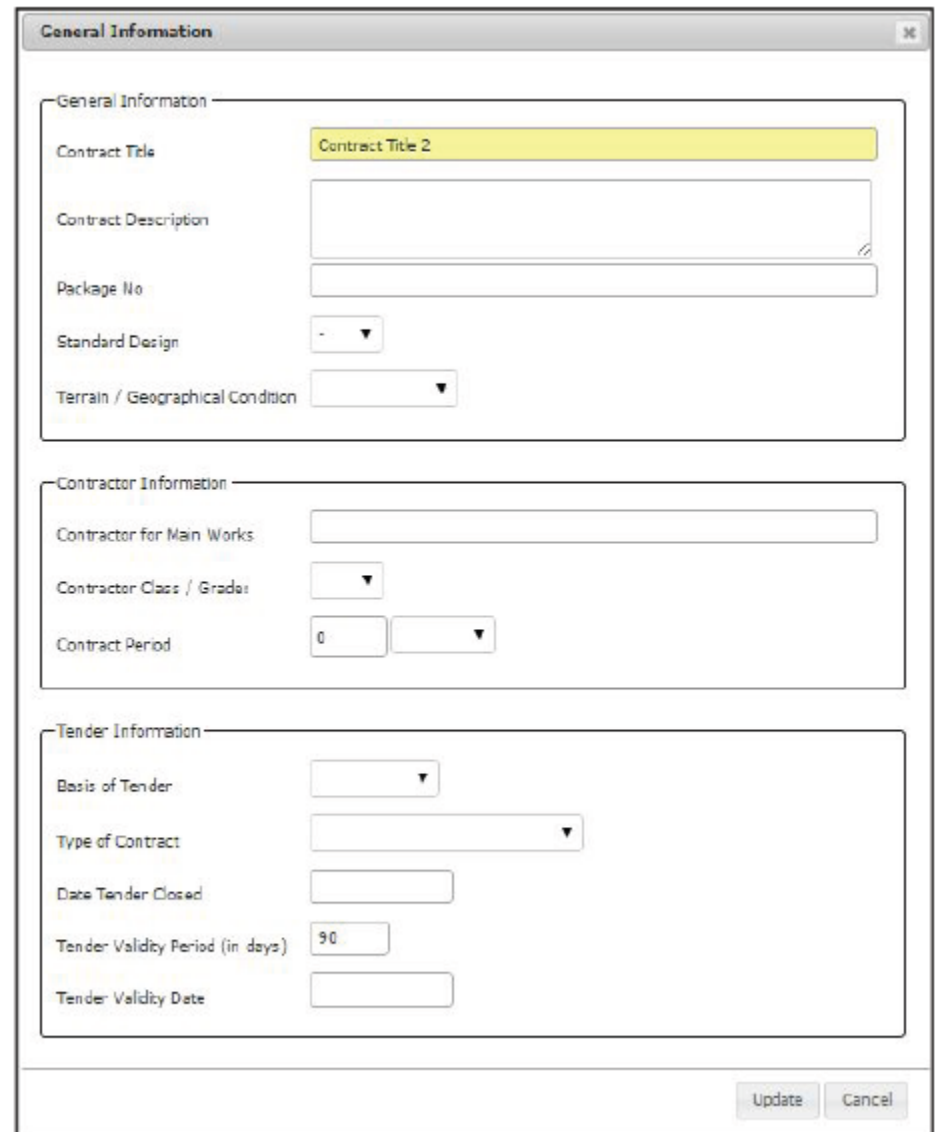


A small dialog box titled "Project Details" with a close button (X) in the top right corner. It contains a text input field labeled "Contract Title" with the text "Contract Title 2" entered. At the bottom, there are two buttons: "Create Detail" and "Cancel".

From the pop-up windows, enter 'Contract Title' and click on button 'Create Detail'. Newly added contract will appear in list of Contract Title as below.

Add Contract

To edit contract information, click on icon , new prompt will appear as below:



A large dialog box titled "General Information" with a close button (X) in the top right corner. It is divided into three sections: "General Information", "Contractor Information", and "Tender Information".
- **General Information**: Contains fields for "Contract Title" (with "Contract Title 2" entered), "Contract Description" (a large text area), "Package No" (a text field), "Standard Design" (a dropdown menu with a downward arrow), and "Terrain / Geographical Condition" (a dropdown menu with a downward arrow).
- **Contractor Information**: Contains fields for "Contractor for Main Works" (a text field), "Contractor Class / Grades" (a dropdown menu with a downward arrow), and "Contract Period" (a text field with "0" and a dropdown menu with a downward arrow).
- **Tender Information**: Contains fields for "Basis of Tender" (a dropdown menu with a downward arrow), "Type of Contract" (a dropdown menu with a downward arrow), "Date Tender Closed" (a text field), "Tender Validity Period (in days)" (a text field with "90"), and "Tender Validity Date" (a text field).
At the bottom right of the dialog box are two buttons: "Update" and "Cancel".

Enter all the required information and click on button 'Update' to save the changes.

Workflow #1 – Data Originated from ATDA Module

Create Project -> Create Contract -> ATDA Data -> ATDA Complete -> CEECA Assignment -> CEECA Data

Workflow #2 – Historical Data (CEECA Only)

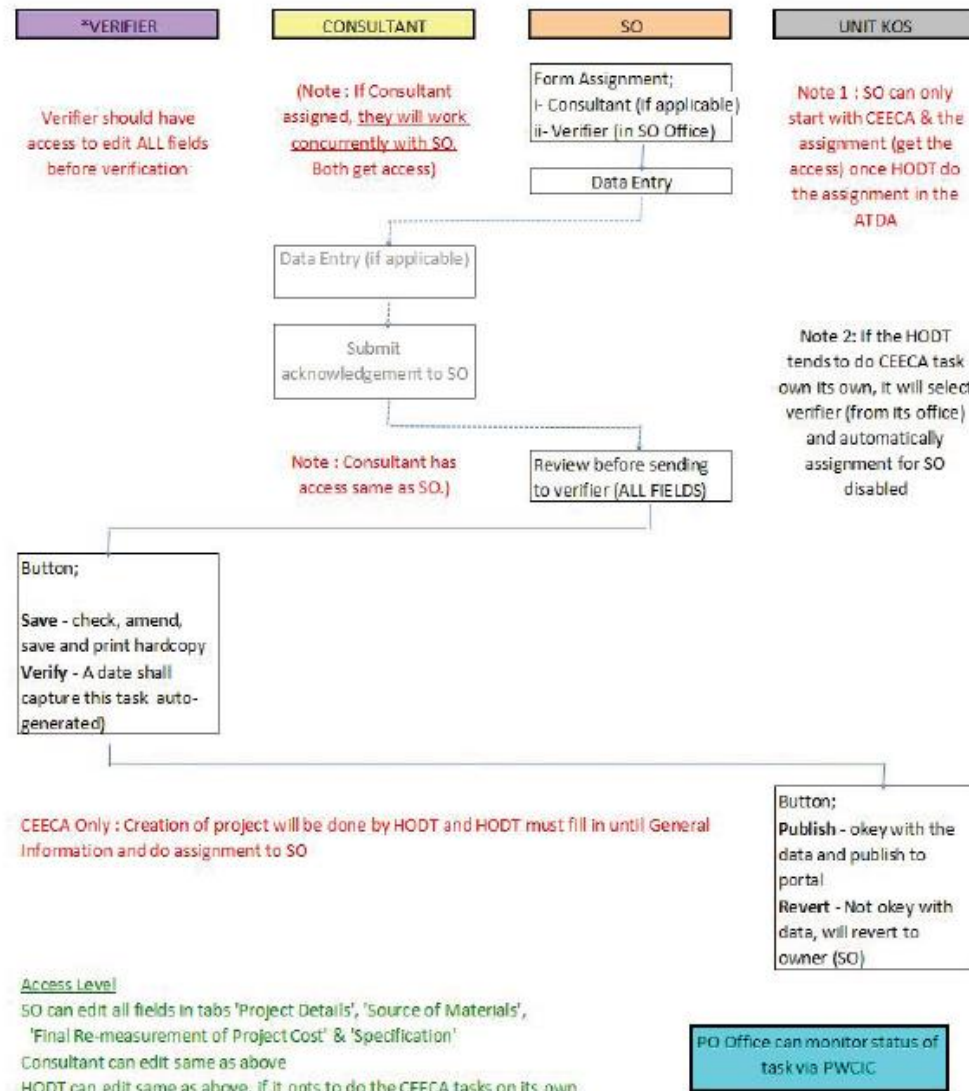
Create Project -> Create Contract -> CEECA Assignment -> CEECA Data

Pejabat terlibat;

- i- HODT
- ii- Perunding (sekiranya perlu)
- iii- S.O.
- iv- Unit Kos (CKUB)

Users Access

3.3.4.1 Flow of CEECA



Notification

3.3.4.2 CEECA Email Notification

<u>CEECA</u>		
1 Assignment from HODT	-	Notification to; SO (Contact Person)
	(cc)	HODT (Contact Person)
2 Assignment by SO User in SO	-	Notification to; Consultant SO (Verifier)
	(cc)	SO (Contact Person)
3 Consultant submit back to SO	-	Notification to; SO (Contact Person)
4 SO submit to Verifier (SO)	-	Notification to; SO (Verifier)
	(cc)	SO (Contact Person)
5 Verification by Verifier (SO)	-	Notification to; SO (Contact Person) Unit Kos (Contact Person)
6 Publication by Unit Kos	-	Notification to; Unit Kos (Contact Person) SO (Contact Person)
7 Reversion by Unit Kos	-	Notification to; SO (Contact Person)

3.3.4.3.1 Open CEECA Data

WORK FLOW STATUS: 1.HOPT 2.Us		MENU BACK EMAIL LOGOUT [Kalsom]					
PROJECT TITLE : Jalan Mukim 6 Linau dan Mukim 7 Se							
No	Contract Title	Created At	Info	ATDA	Rev	CEECA	ACDA
1	Jalan Mukim 6 Linau dan Mukim 7 S	04-08-2014 12:01		5	1	1	1

Once ATDA task has been approved and published, CEECA task is ready to be proceeded. Click on CEECA work flow status number to open CEECA data task.

The screenshot shows the 'CIVIL - CEECA' form. At the top, there is a navigation bar with 'MAIN', 'BACK', 'EMAIL', and 'LOGOUT' buttons, and a user name '(Farah Yasmir)'. Below this is a 'Submit For Verification' button. The form has a tabbed interface with 'Setting / Assignment' selected. The form fields include: 'HOOT' (Office: BKJJ, CKUB), 'SO' (Office: - Select -), 'Verifier' (User: - Select -), and 'Consultant' (Office: - Select - and Person Incharge: - Select -). Four numbered callouts are present: 1 points to the 'CIVIL - CEECA' header, 2 points to the 'Setting / Assignment' tab, 3 points to the 'Submit For Verification' button, and 4 points to the 'HOOT' field.

1. CEECA contract.
2. Selected contract title.
3. Data Navigation Menu Bar.
4. Work Flow Submission Button.

Create CEECA

CEECA Task Assignment

3.3.4.3.4 Project Details

CIVIL - CEECA

MAIN BACK EMAIL LOGOUT [Syahirah]

CONTRACT TITLE : Jalan Nukim 6 Unzu dan 10 Unzu, Denabong, Batu Patek, Johor

Setting / Assignment Project Details Source Of Material Project Element & Cost Brief Specification

SAVE Project Details

CEECA ROAD

Approval Information

Date :

Contract Information

Contract Number :

Form of Contract :

Commencement Date :

Completion Date :

Technical Information

No. of Berms (Highest Slope) : 0 no

Overall Road Length : 0.00 km

Road Length (Nett) : 0.00 km

Shoulder Width : 0.00 m

Type of Shoulder :

Median Width : 0.00 m

Type of Median :

No. of Lane : 0

Type of Carriageway :

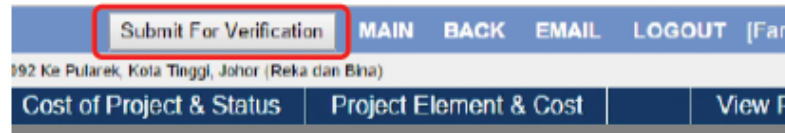
No. of Structures : 0

1. Click on 'Project Details' menu bar.
2. Key-in and select all the required fields of project details (Contract Information & Technical Information. Approval information will be filled by system once approved.)
3. Click on button 'SAVE' to save the changes.

Project Details

Additional information

Data from Project Details & Contract Information will be carried to FORM 1 of CEECA



Work flow submission button will appear on the left side of page navigation menu. Depending on user login level and access type, it will appear or disappear. Following table show work flow status number and login access level where the submission button will take place.

Work Flow Status Number	Status Description	Access Group	Button Appearance
1	Waiting SO user or Consultant to complete the task.	A. SO user B. Consultant	Submit For Verification Acknowledge Work Done
2	Waiting SO user to complete the task and submit for verification.	SO user	Submit For Verification
3	Waiting SO verifier to verify and approve the task.	SO verifier	Approve this CEECA
4	Waiting Unit Cost to approve for publishing.	Unit Kos	Publish or Reject
5	Work task has been published.		

Status Bar

Login by SO office

WORK FLOW STATUS: 1.HOPT 2.Us		MENU BACK EMAIL LOGOUT [Syahira]					
PROJECT TITLE : Jalan Mukim 6 Linau dan Mukim 7 Se							
No	Contract Title	Created At	Info	ATDA	Rev	CEECA	ACDA
1	Jalan Mukim 6 Linau dan Mukim 7 s	04-08-2014 12:01	☰	5	+	2	1

Source of Materials

3.3.4.3.5 Source Of Material

The screenshot shows a software interface for 'Source Of Material'. At the top, there are four tabs: 'Setting / Assignment', 'Project Details', 'Source Of Material' (highlighted with a yellow circle 1), and 'Project Element & Cost'. Below the tabs is a header bar with a 'SAVE' button (highlighted with a yellow circle 3) and the text 'Source Of Material'. Below this is a table with four columns: 'No', 'Description', 'Value', and 'Memo'. The table contains three rows of data, which are highlighted with a yellow circle 2. The first row is '1 Sand & Crusher run' with a value of '0.00' and memo 'km from site'. The second row is '2 Asphaltic Concrete Binder Course & Asphaltic Concrete' with a value of '0.00' and memo 'km from site'. The third row is '3 Imported Earth' with a value of '0.00' and memo 'km from site'.

No	Description	Value	Memo
1	Sand & Crusher run	0.00	km from site
2	Asphaltic Concrete Binder Course & Asphaltic Concrete	0.00	km from site
3	Imported Earth	0.00	km from site

1. Click on 'Source Of Material' menu bar.
2. Key-in all required data. New item description subject to Unit Kos approval, User may request to system administrator to register.
3. Click on button 'SAVE' to save the changes.

Contract Cost

Tidak perlu dimasukkan sekiranya guna Workflow ATDA

Perlu diisi sekiranya guna Workflow CEECA Only

3.3.4.3.6 Project Element & Cost

CIVIL - CEECA MAIN BACK EMAIL LOGOUT [Syahrul]

CONTRACT TITLE : Jalan Mukim 6 Linau dan Mukim 7 Sembong, Batu Pahat, Johor

Setting / Assignment Project Details Source Of Material **Project Element & Cost** Brief Specification View Report

Project Element & Cost

REF	DESCRIPTIONS OF WORK	Contract Cost (RM)	Allocation Provisional Sum Items from Original Contract Cost	Adjustment Due to Remeasurement of Final Quantities (Addition/ Omission)	Final Cost (RM)
1	PRELIMINARIES				
1a	GENERAL ITEMS	1,434,700.00	0.00	0.00	1,434,700.00
2	MAIN WORKS				
2a	SITE CLEARANCE AND DEMOLITION WORKS	76,720.00	0.00	0.00	76,720.00
2b	EARTHWORKS	1,846,905.00	0.00	0.00	1,846,905.00
2c	DRAINAGE WORKS	324,631.00	0.00	0.00	324,631.00
2d	PAVEMENT WORKS	3,898,814.60	0.00	0.00	3,898,814.60
2e	ROAD FURNITURE	277,000.00	0.00	0.00	277,000.00
2f	GEOTECHNICAL WORKS	6,568,340.50	0.00	0.00	6,568,340.50
3	STRUCTURES	1,278,455.70	0.00	0.00	1,278,455.70
2h	TRAFFIC MANAGEMENT & CONTROL	1,959,900.00	0.00	0.00	1,959,900.00
2i	ENVIRONMENTAL PROTECTION WORKS	199,329.00	0.00	0.00	199,329.00
2j	ROUTINE MAINTENANCE WORKS	520,000.00	0.00	0.00	520,000.00
4	OTHERS	161,150.00	0.00	0.00	161,150.00
	SUM	781,150.00	0.00	0.00	781,150.00
3	PRIME COST SUM & PROVISIONAL SUM	857,250.00	0.00		857,250.00
	TOTAL	19,403,245.80		0.00	19,403,245.80

Element & Cost

Data will be carried to FORM 2, 3, 5 of CEECA

1. Click on 'Project Element & Cost' menu bar.
2. To change the record value, double click on the numbers, key-in and press enter key to update.

3. Click on 'STRUCTURES' to add new, edit & deletion of structure data.
4. Click on 'OTHERS' to add new, edit & deletion of others data.

3.3.4.3.6.1 Structures

2g	STRUCTURES	1,278,455.70
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To add new structure, click on 'STRUCTURES' link as above.

New Structure Data

Save

Structure Name :
Structure Specification : Type and Size of Pile, Type of Structure and etc
Type of Piling :
Dimension Length : 0.0
Type of Structure :
Dimension Width : 0.0
No. of Spans : 11.3
Total Length of Pile : 0.0

DESCRIPTIONS OF WORK	Contract Cost (RM)	Allocation Cost (*1)	Adjustment Cost (*2)	Final Cost (RM)
Temporary Works	0.00	0.00	0.00	0.00
Piling	0.00	0.00	0.00	0.00
Substructure	0.00	0.00	0.00	0.00
Superstructure	0.00	0.00	0.00	0.00
Pavement	0.00	0.00	0.00	0.00
Total	0.00	0.00	0.00	0.00

*1 Allocation of Provisional Sum Items from Original Contract Cost
*2 Adjustment Due to Reassessment of Final Quantities (Addition / Deduction)

CLOSE

From new pop-up window, select and key-in all required data.

For field 'Structure Specification', key-in data will be listed at 'Brief Specification' menu (item 3.3.4.3.7).

Field 'Type of Piling', 'Type of Structure' and 'No. Of Spans' are compulsory to be selected.

Click on button 'SAVE' to save new structure data.

Structure

2g	STRUCTURES	0.00
	Structure 1	0.00
2h	TRAFFIC MANAGEMENT & CONTROL	1,959,900.00

To edit structure data, click on structure data as above.

Select and key-in all required data, click on button 'SAVE' to update.

Others

3.3.4.3.6.2 Others (Main Works)

OTHERS (MAIN WORKS) ✕

2k	DESCRIPTIONS OF WORK	Contract Cost (RM)	Allocation Cost (*1)	Adjustment Cost (*2)	Final Cost (RM)	Action
	--- Select --- ▼	0.00	0.00	0.00		 
1	OSHA	161,150.00	0.00	0.00	161,150.00	 
	TOTAL	161,150.00	0.00	0.00	161,150.00	

*1 Allocation of Provisional Sum Items from Original Contract Cost
 *2 Adjustment Due to Remeasurement of Final Quantities (Addition/ Omission)

CLOSE

Click on  to add new data, select and key-in required data, click on  to save.

Click on  to edit existing data, select and change required data, click on  to save.

Click on  to delete existing record, click on 'YES' from the confirmation window.

Brief Specification

Data will be carried to FORM 5 of CEECA

3.3.4.3.7 Brief Specification

1

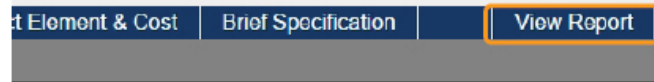
Setting / Assignment	Project Details	Source Of Material	Project Element & Cost	Brief Specification
Brief Specification				
REF	BILL	SPECIFICATION		
2	MAIN WORKS			
2a	SITE CLEARANCE AND DEMOLITION WORKS			
2b	EARTHWORKS			
2c	DRAINAGE WORKS			
2d	PAVEMENT WORKS			
2e	ROAD FURNITURE			
2f	GEOTECHNICAL WORKS			
2g	STRUCTURES			
2h	TRAFFIC MANAGEMENT & CONTROL			
2i	ENVIRONMENTAL PROTECTION WORKS			
2j	ROUTINE MAINTENANCE WORKS			
2k	OTHERS			
	i) OSHA			

1. Click on 'Brief Specification' menu bar.
2. To enter or edit specification description, double click on highlighted row, key-in and press enter key to update.

Specification for site clearance

CEECA Report

3.3.4.3.8 View Report



User can view report at any time in pdf format, click on 'View Report' menu bar to view the report. It depends on the browser type, the report may open in different view tab or automatically downloaded to the PC.

CIVIL ENGINEERING ELEMENTAL COST ANALYSIS - FORM 1			
PROJECT COST ANALYSIS			
JOB TITLE:	recheck stia vflow 000614	CLIENT:	Kementerian Pendidikan
LOCATION:	Pahang		
GENERAL PROJECT INFORMATION			
<u>Project Details and Site Condition</u>			
Project Brief Description	R4		
Project Category:			
JKR Design Standard:	R5		
Terrain / Geographical Condition:	Flat		
No. of Berms (Highway Slope):	1 no		
Overall Road Length:	5.00 km		
Road Length (Net):	4.90 km		
Shoulder Width:	2.00 m	Type of Shoulder:	Paved
Median Width:	1.50 m	Type of Median:	Paved
No. of Lane:	0	Type of carriageway:	2-lane dual carriageway
No. of Structures:	1		
<u>Contract Particulars</u>		<u>Adjustment of Contract Sum</u>	
Contract No.:	JKR123 2012	Original Contract Sum :	RM 50,000,000.00
Basis of Tender:	open	Adjusted Contract Sum :	RM 49,980,000.00
Type of Contract:	Conventional - Local	Amount Decrease :	-RM 40,000.00
Form of Contract:	PWD 203A	% Decrease :	-0.08 %
Contract Period:	30 Months		
Date of Tender:	08-12-2011		
Commencement Date:	03-06-2012		
Completion Date (Original):	03-12-2014		
<u>Other Information</u>			
<u>Source of Materials</u>			
i) Sand & Gravel run:	10.00 km from site		
ii) Asphaltic Concrete Binder Course & Asphaltic Concrete Wearing Course	10.00 km from site		
iii) Imported Earth	10.00 km from site		

CEECA Analysis

- CEECA Report
- Road Analysis
- Structure Analysis