
**Annex 1.A Software
Requirement Specification**

***eServices for
Department of
Commerce***

Information and
Communication Technology
Agency of Sri Lanka

DOCUMENT RELEASE NOTICE

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Glossary

COO	-	Certificate of Origin
CSS	-	Cascading Style Sheets
DAO	-	Data Access Object
DoC	-	Department of Commerce
HTTP	-	Hypertext Transfer Protocol
HTTPS	-	Hypertext Transfer Protocol Secure
IE	-	Internet Explorer
ICTA	-	Information and Communication Technology Agency
No.	-	Number
Ref.	-	Reference
SMS	-	Short Message Service
UI	-	User Interface
URL	-	Uniform Resource Locator

1 Introduction

The Department of Commerce (DoC) is responsible for foreign trade policy formulation, and all related coordination and implementation matters, with the objective of developing and promoting Sri Lanka's foreign trade relations at bilateral, regional and multilateral levels.

Department mission is to develop and promote Sri Lanka's foreign trade relations by the effective implementation of government trade policy, with a view to raising the standards of living and realizing a higher quality of life through the increase of total production, income and employment levels, thereby actively contributing to the overall economic growth of Sri Lanka.

The DoC is the national focal point responsible for the evaluation and negotiation of new bilateral, regional and multilateral trade agreements, and the implementation of existing bilateral, regional and multilateral agreements. The Department is also the certifying agency for certificates of origin under these Agreements.

ICTA intends to support the operations related to the above activity through implementing eServices for DOC. eService scope under this project includes the following two main applications;

1. Citizen application for exporters to submit applications for Certificate of Origin through Lanka Gate;
2. Department application to manage activities related to exports management. This document details out the requirements to be implemented through each of these eServices.

A summary of the eServices under each of these applications are listed below.

#	eService	Type of eService	Stakeholder Type	
			DoC	Exporter
1.	Manage Exporters	G2C	√	
2.	Enter Cost Statements/ Affidavits	G2C	√	
3.	Apply/ Reapply COO	G2C	√	√
4.	Manage COOs	G2C	√	
5.	Request COO copies	G2C	√	√
6.	Allocate Annual Quota	G2C	√	

Table 1 : DoC eService Summary

2 Requirement Specification

The process and activities are divided according to the users in the system

2.1 Process Overview

2.1.1 Process description

There are two main users that are accessing the solution. Each set of users will be having a separate set of functionalities in the system.

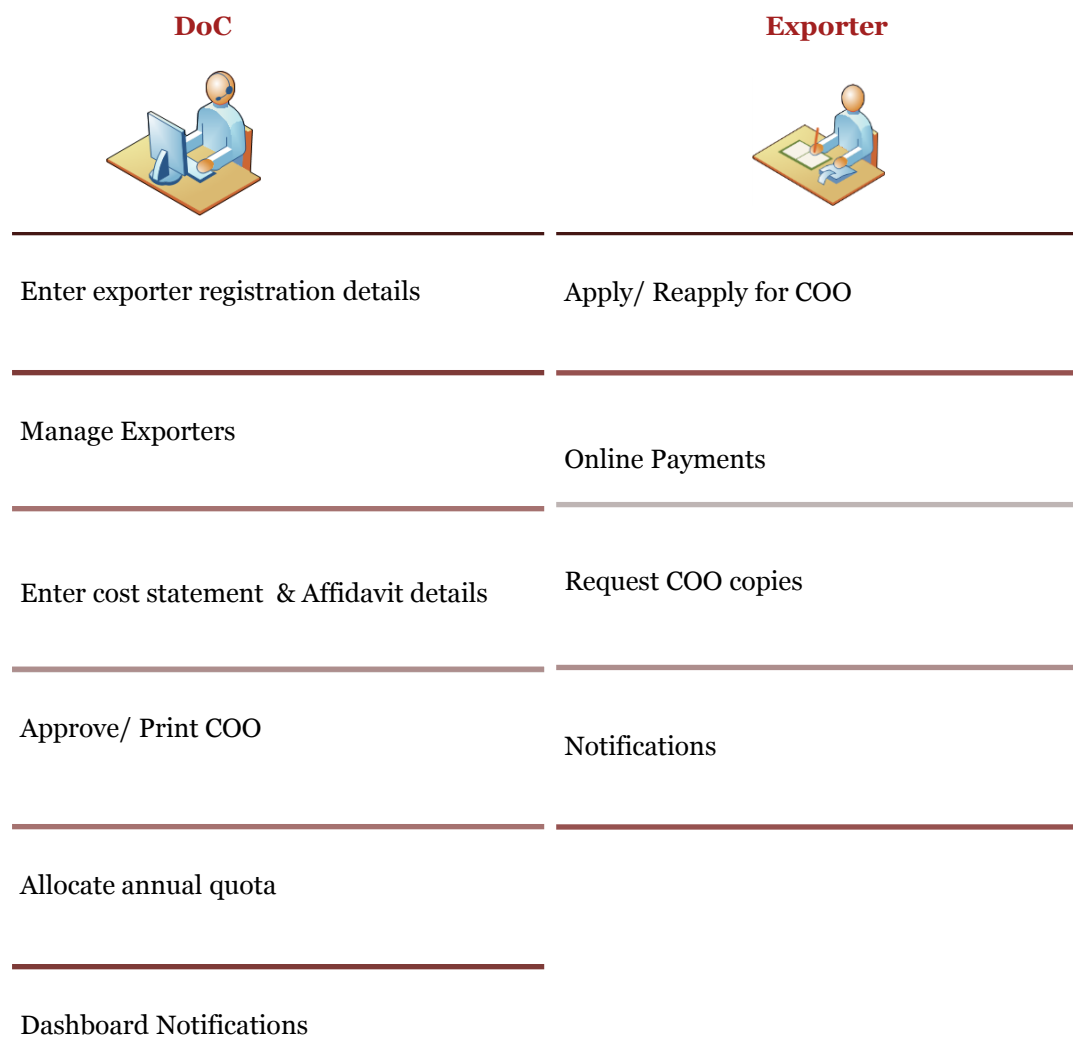


Figure 1 : DOC eServices Overview

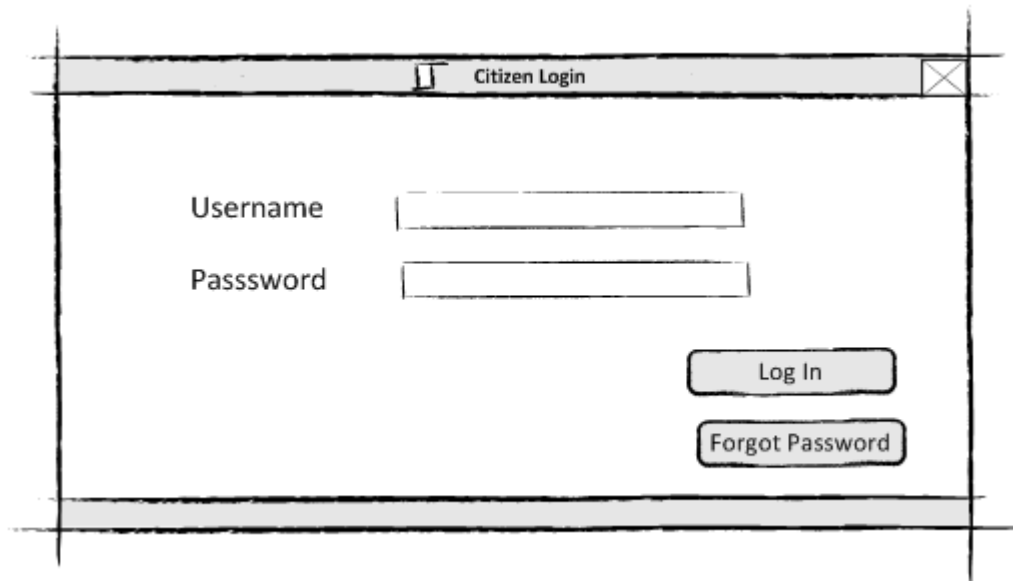
2.2 eServices for Exporter (Citizen Application)

2.2.1 Citizen Application Login & Dashboard

2.2.1.1 Use Case: Citizen Application Login & Dashboard

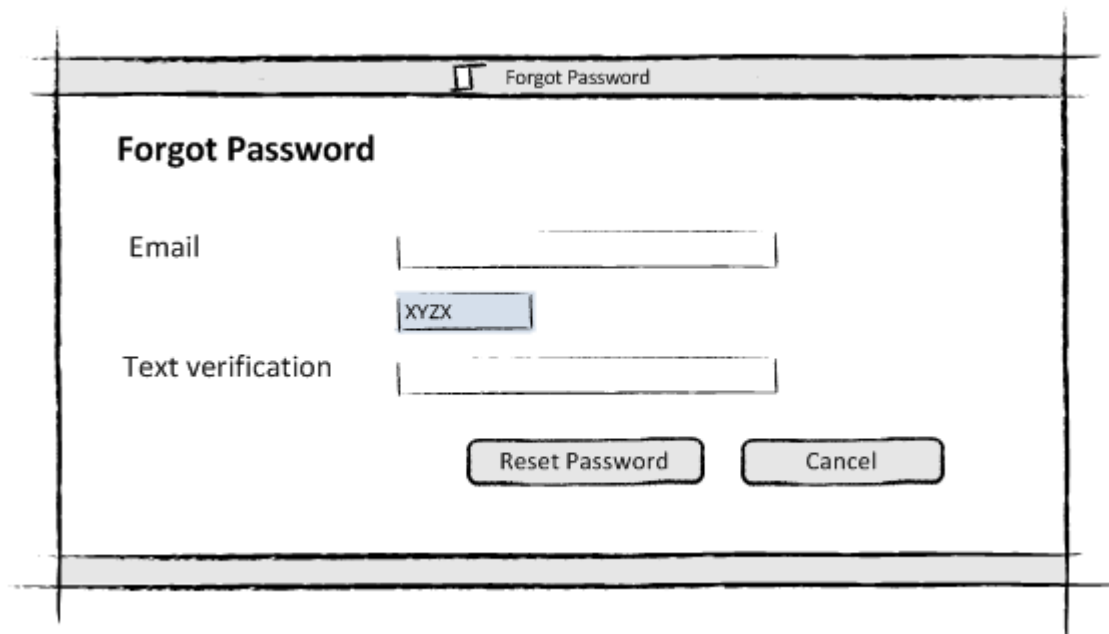
Use Case #/ID	Case	Description	
	01		Citizen Application Login
Initiating Actor	Exporter/ Department User	Other Actors	Department User
Use Case Overview			
Registered exporter or an authorised department user can login to the application via 'www.srilanka.lk'			
Pre-conditions			
1. The user should have a valid (active/ not suspended) login account that is provided by DOC			
Business Rules			
1. User should be identified from the login name; as an exporter, department user or a third party user. 2. Third party users should be restrained from login to the system by displaying a message stating 'Please enter a valid Username/ Password' 3. System generated password should be send to the registered email address of the user, when click on the 'Forgot password' button after entering the validation text. Message should be displayed stating 'System generated password has been sent to the registered email address'. 4. Confirmation email should be send to the registered email address of the user, when change the password.			
Main Event List/Flow of Events			
1. Registered exporter or an authorized department user can login to the application and perform the following functionalities i. Change password ii. Apply for a new COO iii. Reapply for a COO iv. Request for COO copies 2. Exporter should be able to view the statuses of the COOs in a grid format that have been applied by the logged in exporter during the last 7 days. This grid should be blank for the department user.			
Alternate Event List/Flow of Events			
1. User enters an incorrect username/ password Error message should be displayed stating 'Please enter Username and Password correctly'. 2. User enters an incorrect text verification Error message should be displayed stating 'Please enter the text verification correctly'. 3. User enters an incorrect current password Error message should be displayed stating 'Please enter the current password correctly'. 4. User enters the confirmation password incorrectly Error message should be displayed stating 'New password and confirm password should be the same'.			

2.2.1.2 Wire Frames: Exporter Log in & Dashboard



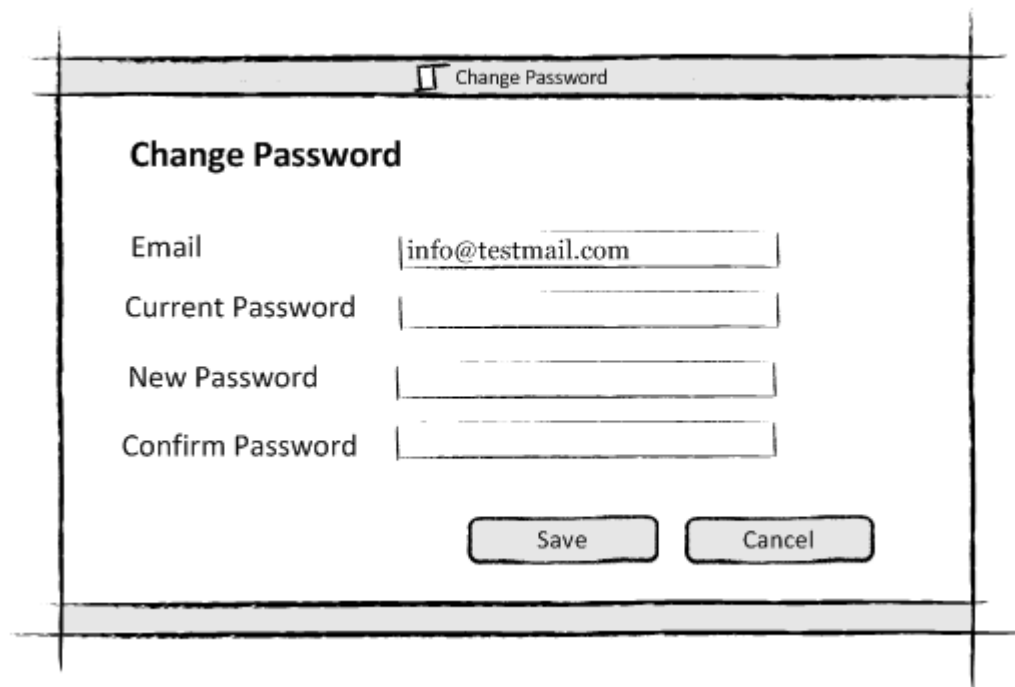
A wireframe for a 'Citizen Login' form. The form is enclosed in a rectangular border. At the top, there is a header bar with the text 'Citizen Login' and a close button (X) on the right. Below the header, the form contains two input fields: 'Username' and 'Passsword' (note the typo). To the right of each input field is a label. Below the input fields, there are two buttons: 'Log In' and 'Forgot Password'.

Figure 2: Exporter Login

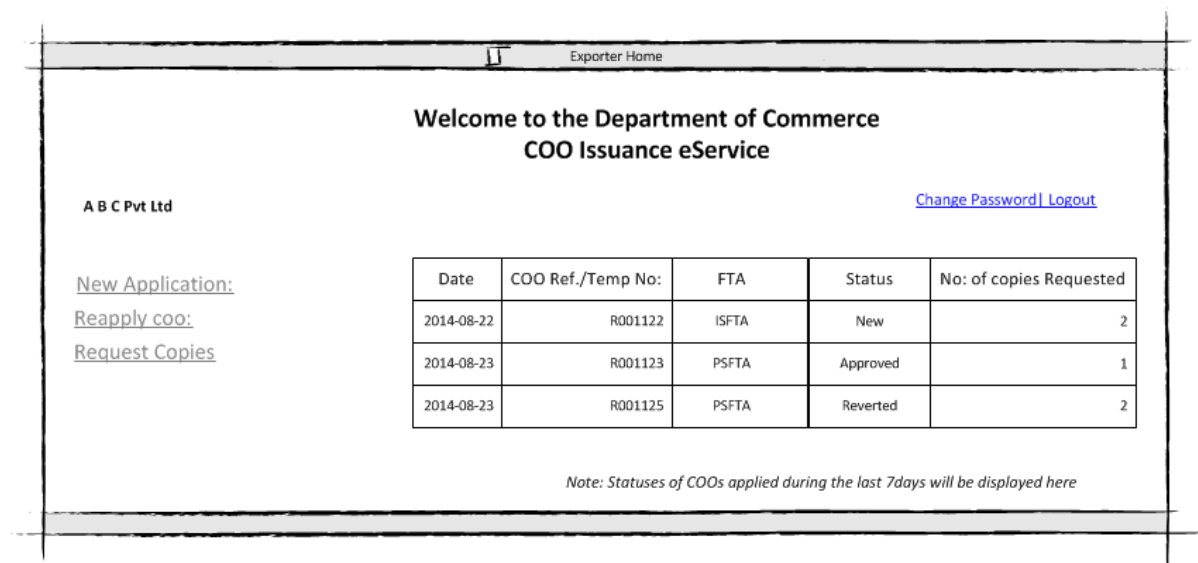


A wireframe for a 'Forgot Password' form. The form is enclosed in a rectangular border. At the top, there is a header bar with the text 'Forgot Password' and a close button (X) on the right. Below the header, the form contains three input fields: 'Email', a field with the text 'XYZX' (likely a placeholder or a sample value), and 'Text verification'. To the right of each input field is a label. Below the input fields, there are two buttons: 'Reset Password' and 'Cancel'.

Figure 3: Reset Password



The image shows a web form titled "Change Password". At the top, there is a header bar with a home icon and the text "Change Password". Below the header, the form has a title "Change Password". It contains four input fields: "Email" with the value "info@testmail.com", "Current Password", "New Password", and "Confirm Password". At the bottom, there are two buttons: "Save" and "Cancel".

Figure 4: Change Password

The image shows the "Exporter Home" page. At the top, there is a header bar with a home icon and the text "Exporter Home". Below the header, the page has a title "Welcome to the Department of Commerce COO Issuance eService". On the left, there is a user name "A B C Pvt Ltd" and three links: "New Application:", "Reapply coo:", and "Request Copies". On the right, there are two links: "Change Password" and "Logout". In the center, there is a table with 5 columns: "Date", "COO Ref./Temp No:", "FTA", "Status", and "No: of copies Requested". The table contains 3 rows of data. Below the table, there is a note: "Note: Statues of COOs applied during the last 7days will be displayed here".

Date	COO Ref./Temp No:	FTA	Status	No: of copies Requested
2014-08-22	R001122	ISFTA	New	2
2014-08-23	R001123	PSFTA	Approved	1
2014-08-23	R001125	PSFTA	Reverted	2

Figure 5: Exporter Home Page

2.2.1.3 Data Fields: Exporter Login

Data	Data Type	Mandatory
Exporter Login Screen		
Username	Text	Yes
Password	Text	Yes
Reset Password		
Email	Text (Display only)	Yes
Test Verification	Text	Yes
Change Password		
Email	Text (Display only)	
Current password	Text	Yes
New Password	Text	Yes
Confirm Password	Text	Yes

Table 2 : Data Fields of Exporter Login

2.2.1 Apply/Re-apply for Certificate of Origin

2.2.1.4 Use Case: Apply/Re-apply Certificate of Origin

Use #/ID	Case	Description	
	02		Apply/ Reapply for COO
Initiating Actor	Exporter/ Department User	Other Actors	Department User
Use Case Overview			
Exporter should obtain a Certificate of Origin (COO) under a relevant Free Trade Agreement (FTA) to exploit the benefits of the FTA. A COO should be obtained for each shipment. There should be a valid cost statement or an affidavit for each product, to apply for a COO.			
Pre-conditions			
1. The user has successfully logged in to the www.srilanka.lk portal 2. Exporter should be a registered exporter in DoC 3. There should be an approved and valid cost statement or an affidavit in the system for the relevant products under the relevant FTA			
Business Rules			
1. Application for a COO or reapplying for an already issued COO can be submitted only through the citizen application. 2. The system will identify the user as an exporter or a department user through the login 3. 'Exporter Registration No.' field should be enabled only for department users. Relevant exporter registration number and name should be displayed for the logged in exporter. 4. 'Retrieve saved application' tick box should display only for new applications. 'Reference/ (Temp) Number' field should be enabled for new application, when tick the 'Retrieve saved application' tick box. 5. 'Reference/ (Temp) Number' field should be enabled for reapplications. 6. FTAs are listed only if a valid cost statement/ affidavit is available for the selected exporter 7. Products are listed only if a valid cost statement/ affidavit is available for the selected FTA 8. 'Quota on this certificate' cannot be greater than balance quota 9. Only one product is allowed for one COO application when Quota is applied 10. Multiple products are allowed in normal COO applications (non-quota) for tariff concessions 11. A temporary COO reference number is issued to the exporter as a reference till the COO is approved 12. Temporary COO reference number should be generated from the system in the format of 'T/<Agreement>/XXX'. 13. Application fee will not be charged for re-applications 14. Balance quota amount should be updated for the exporter as well as for the relevant product in FTA, when a COO with quota has been cancelled.			
Main Event List/Flow of Events			
1. Exporter can apply or reapply a COO by selecting the relevant radio button. Department user also can apply or reapply for a COO on a request of an exporter by entering the relevant exporter's registration number. 2. Apply for a new COO: a. 'Free Trade Agreement Name' drop down should list FTAs only with valid cost statement or affidavit for the exporter. b. 'HS Codes' should be listed based on the products with valid cost statements or			

affidavit for the selected FTA and selected/logged in exporter.

- c. More than one product can be included in a COO. The user may add items accordingly and the Item Detail section has to be filled in for each product.
- d. Relevant Cost Statement or Affidavit numbers should be displayed based on the exporter, FTA and products applied. One COO shall be linked to multiple Cost Statements and Affidavits.
- e. Quota section shall be activated only for the FTAs marked as quota available. 'Tariff Rate Quota' section' should be displayed only when clicked on the 'Add Quota' button
- f. Only the products with a quota allocation are allowed in the quota section. If applying for Quota, only one product is allowed. Exporters should apply for multiple certificates if it is required to apply for multiple quotas for products on COO. If a quota is requested then tariff concessions for other items cannot be applied through the same application.
- g. Quota details of the entered product (Total Quota, Quota Utilized, and Balance) shall be displayed when clicked on the 'Add Quota' button. User should be able to enter 'Quota on this Certificate'.
- h. User can add multiple products by entering relevant data fields and clicking the '+' button. Quota details can be entered for each product by clicking 'Add Quota' button.
- i. 'Payment Receipt No.' field should be enabled only for department users to enter the manual receipt number.
- j. 'Postal Address' field should be enabled only when the user selects the certificate collection method as 'Post'.
- k. Total fee will be calculated based on the application fee, requested number of copies and the collection method. The application fee, charges for a copy and the postal charge shall be pre-defined in the system.
- l. When the department user clicks the 'Submit' button, the COO application shall be saved and be listed under the 'Manage COO' function. Such applications shall be identified as manually submitted applications.
- m. When an exporter clicks on the 'Submit' button after entering all mandatory data, the system should be directed to the payment gateway for online payments. Once the payment is successfully made, the COO application shall be listed under the 'Manage COO' function. Such applications shall be identified as online submitted applications.
- n. A transaction reference number shall be generated through the system for the payment
- o. Payment confirmation screen shall be displayed stating the details of the payment. Exporter can proceed to the payment gateway by clicking the 'Pay' button
- p. Printable payment confirmation receipt shall be displayed after a successful payment. This payment confirmation receipt shall be emailed to the exporter as a reference
- q. The application shall generate a temporary COO reference number and will be displayed for the user.
- r. The applications with the 'Revert' status can be extracted with the temporary reference number. Exporters may adjust the relevant detail in the application form and re-submit the form. This will not involve any payments.

3. Reapply for a COO:

- a. Exporters can re-apply for COOs that are approved and later cancelled by DOC
- b. All approved and then cancelled reference numbers of COOs of the relevant exporter should be listed down when clicked on the 'Fetch' button. Results should be filtered based on the entered data. This is a mandatory data field when reapplying a COO.
- c. When the relevant COO is selected, the data entered for the selected COO should

be loaded into the form. Exporter may edit this data and re-submit. Only the charges for the number of copies and the postal charges (if applicable) shall be charged. Application fee will not be charged for re-applications.

4. User can save the 'New' COO applications temporally by clicking the 'Save' button and can retrieve the COO later by entering the system generated 'Temporary reference number'.
5. All data fields will be cleared when clicked on the 'Reset' button

Alternate Event List/Flow of Events

1. Allocated quota values (Total Quota, Quota Utilized, and Balance) for a selected product should be displayed in section 11, based on the entered values in 'Quota Allocation' screen for an exporter and for a product under a FTA.
2. User entered FOB value of exporting products should be displayed in 'Exporter/ FTA Statistics Report'
3. Message should be displayed stating 'Online payment is unsuccessful. Please retry.' for unsuccessful payments.
4. Message should be displayed stating 'Please enter all mandatory fields.', when the user submit the application without entering all mandatory fields.

2.2.1.5 Wire Frames: Certificate of Origin Application



COO Application.pdf

Figure 6: Certificate of Origin Application



Payment Confirmation.pdf

Figure 7: Payment Confirmation



Payment Receipt.pdf

Figure 8: Online Payment Receipt

2.2.1.6 Data Fields: Certificate of Origin Application

Data	Data Type	Mandatory
New/ Reapply	Radio button	
Exporter Registration No.	Text	Yes
Exporter Name	Text (Display only)	
Reference/ (Temp) Number	Number	
Free Trade Agreement Name	Drop down selection	Yes
Exporter Address	Text	Yes
Consignee's Name	Text	Yes
Consignee's Address	Text	Yes
Consignee's Country	Drop down selection	Yes

Mode of Transport	Drop down selection	Yes
Vessel/ Flight No.	Text	Yes
Port of Loading	Drop down selection	Yes
Port of Discharging	Text	Yes
Declaration	Text	Yes
CUSDEC No.	Text	Yes
Office Code	Text	Yes
Voyage No.	Text	Yes
Departure Date	Date Selection	Yes
Item Detail		
HS Code	Text	Yes
Marks	Text	Yes
No. of Packages	Text	Yes
Origin Criterion	Drop down selection	Yes
Gross Weight or other Qty.	Number	Yes
Units	Drop down selection	Yes
Invoice Number	Text	Yes
Invoice Date	Date Selection	Yes
FOB Value (USD)	Number	Yes
Quota		
Quota on this Certificate	Number	Yes (only if applying for
Origin Country	Text	Yes
Date	Date Selection	
No of Copies	Number	Yes
Collection Method	Drop down selection	Yes
Postal Address	Text	
Total Fee (LKR)	Number	
Payment Receipt No.	Text	Yes (if manual application)

Table 3 : Data Fields of Certificate of Origin Application

2.2.2 Request Copies of Certificate of Origin

2.2.2.1 Use Case: Request COO Copies

Use Case #/ID	03	Description	Request COO Copies
Initiating Actor	Exporter	Other Actors	Department User
Use Case Overview			
Exporter can request for copies of the certificates of origins that they have obtained from the Department			
Pre-conditions			
1. The user has successfully logged in through the www.srilanka.lk portal 2. User should be a registered exporter or an authorized department user 3. Relevant exporter should have a valid/approved COO			
Business Rules			
1. 'Exporter Registration No.', 'Receipt No.' fields and 'Save' button should be displayed only for the department users. 2. Exporter name should be displayed according to the logged in exporter or selected exporter registration number by a department user. 3. Exporters can make copy requests only for their COOs. Department user can submit copy requests for the COOs of a selected exporter. 4. Fees should be calculated based on the selected number of copies and collection method.			
Main Event List/Flow of Events			
1. Exporter shall request copies of COO by entering the relevant COO Reference number. Department user also can request copies of COO on behalf of an exporter by entering the relevant exporter's registration number and the COO Reference number. 2. FTA, product and consignee country should be displayed based on the selected reference number 3. 'Postal Address' field should be enabled only when the user selects the collection method as 'Post'. 4. A copy request cannot be submitted if there is a previously submitted, un-processed COO copy request in the system 5. Department user can save the request after entering all mandatory data and pressing the 'Save' button. 'Transaction Ref No.' should be displayed when saving the record. 6. After entering all mandatory data, exporter can proceed for payment by clicking the 'Confirm & Pay' button. 7. Payment confirmation screen shall be displayed stating the details of the payment and the payment reference number. Exporter can proceed to the payment gateway by clicking the 'Pay' button 8. Payment confirmation screen shall be displayed stating the details of the payment. Exporter can proceed to the payment gateway by clicking the 'Pay' button 9. Printable payment confirmation receipt shall be displayed after a successful payment. The			

same receipt shall be emailed to the exporter.

10. All data fields will be cleared when clicked on the 'Reset' button

Alternate Event List/Flow of Events

1. Message should be displayed stating 'Please enter a valid COO reference number.', when the user enters an incorrect or cancelled COO reference number.
2. Message should be displayed stating 'Please enter all mandatory fields.', when the user submit the application without entering all mandatory fields.
3. Message should be displayed stating 'Online payment is unsuccessful. Please retry.', for unsuccessful payments.

2.2.2.2 Wireframe: Request COO Copies



Request COO
Copies.pdf

Figure 9 : Request COO Copies

2.2.2.3 Data Fields: Request COO Copies

Data	Data Type	Mandatory
Exporter Registration No.	Text	Yes
Exporter Name	Text (Display only)	
COO Ref. No.	Number	Yes
FTA	Text (Display only)	
Product	Text (Display only)	
Consignee's Country	Text (Display only)	
No. of copies	Drop down selection (1-5)	Yes
Collection method	Drop down selection (By Hand/ By Post)	Yes
Postal Address	Text	Yes (only if the collection method is post)
Receipt No.	Text	Yes (only for manual applications)
Transaction ref. No.	Text	
Charges for copies	Number	
Postal charges	Number	
Total	Number	

Table 4 : Data Fields for Request for COO Copies

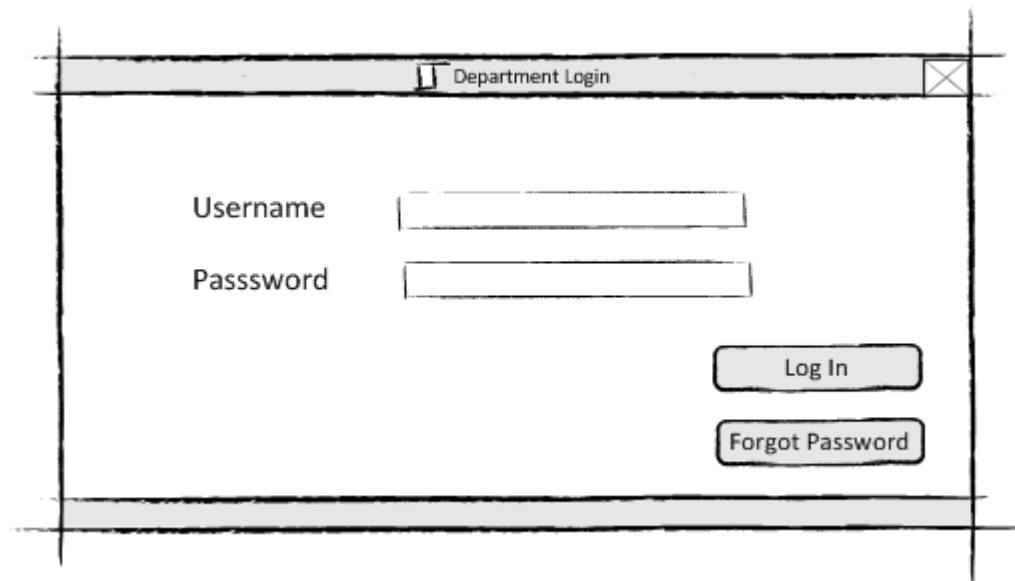
2.3 eServices for the Department (Department Application)

2.3.1 Department Application Login & Dashboard

2.3.1.1 Use Case: Department Application Login & Dashboard

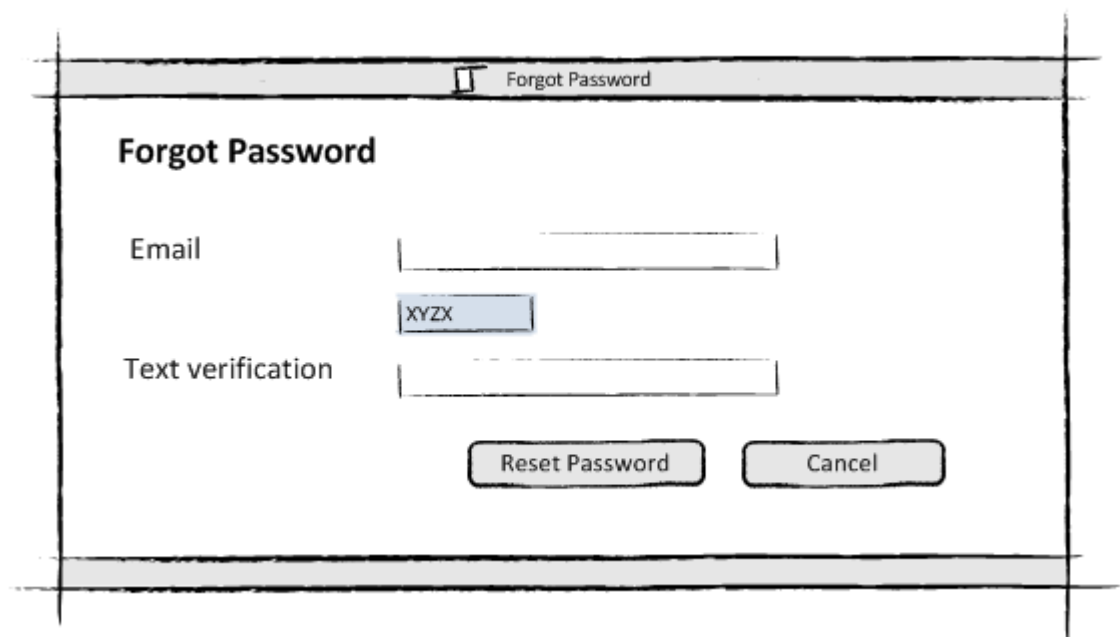
Use Case #/ID	04	Description	Department application login
Initiating Actor	Department user	Other Actors	
Use Case Overview			
Authorized department user can log in to the department application			
Pre-conditions			
1. There shall be mainly two user groups name 'Department User' and 'Department Admin'. 2. User accounts should be created through the Common Admin application			
Business Rules			
1. Third party users should be restrained from login to the system by displaying a message stating 'Please enter a valid Username/ Password' 2. When click on the 'Forgot password' button after entering the validation text, system generated password should be send to the registered email address of the user. Message should be displayed stating 'System generated password has been sent to the registered email address'. 3. Confirmation email should be send to the registered email address of the user, when change the password.			
Main Event List/Flow of Events			
1. Authorized department user can login to the department application and perform the following functionalities I. Change password II. Enter registered exporters details III. Manage exporters IV. Manage COOs V. View Daily Transaction Report VI. View Statistics Report 2. Department user should be able to view number of pending COOs in the queue if the user has access to the 'Manage COO' function. The number represents the pending COOs for checking or for approval based on the logged in user.			
Alternate Event List/Flow of Events			
1. User enters an incorrect username/ password: Error message should be displayed stating 'Please enter Username and Password correctly'. 2. User enters a suspended username: Error message should be displayed stating 'Entered username has been suspended'. 3. User enters an incorrect email format: Error message should be displayed stating 'Please enter email correctly'. 4. User enters incorrect text verification: Error message should be displayed stating 'Please enter the text verification correctly'. 5. User enters current password incorrectly: Error message should be displayed stating 'Please enter the current password correctly'. 6. User enters the confirmation password incorrectly: Error message should be displayed stating 'New password and confirm password should be the same'.			

2.3.1.2 Wireframe: Department Login & Dashboard



A wireframe of a web form titled "Department Login". The form is enclosed in a rectangular border. At the top, there is a header bar with the title "Department Login" and a close button (X) on the right. Below the header, the form contains two input fields: "Username" and "Password". To the right of the "Password" field, there are two buttons: "Log In" and "Forgot Password".

Figure 10: Department Login



A wireframe of a web form titled "Forgot Password". The form is enclosed in a rectangular border. At the top, there is a header bar with the title "Forgot Password" and a close button (X) on the right. Below the header, the form contains two input fields: "Email" and "Text verification". To the right of the "Text verification" field, there is a small blue box containing the text "XYZX". Below the input fields, there are two buttons: "Reset Password" and "Cancel".

Figure 11: Department User - Forgot Password

The screenshot shows a web form titled "Change Password" within a header bar that also contains a "Change Password" link. The form contains four input fields: "Email Address" (pre-filled with "info@testmail.com"), "Current Password", "New Password", and "Confirm Password". At the bottom of the form are two buttons: "Save" and "Cancel".

Figure 12: Department User Change Password

The screenshot shows the "Department Home" page. The header bar includes a "Department Home" link. The main heading is "Welcome to the Department of Commerce COO Issuance eServices". Below this, the user "A. Perera" is logged in, with links for "Change Password" and "Logout". A list of service links is provided: "Exporter Registration", "Manage Exporters", "Manage COO", "Record Cost Statements/ Affidavits", "Annual Quota Allocation", "Daily Transaction Report", and "Statistics Report". A "Notifications" box on the right states: "Pending COOs on queue today - 98".

Figure 13: Department Home Page

2.3.1.3 Data Fields: Department User Login & Dashboard

Data	Data Type	Mandatory
Exporter Login Screen		
Username	Text	Yes
Password	Text	Yes
Reset Password		
Email Address	Text (Display only)	Yes
Test Verification	Text	Yes
Change Password		
Email Address	Text (Display only)	
Current password	Text	Yes
New Password	Text	Yes
Confirm Password	Text	Yes

Table 5 : Data Fields for Department Login

2.3.2 Exporter Registration

2.3.2.1 Use Case: Exporter Registration

Use Case #/ID	05	Description	Enter registered exporter details
Initiating Actor	Department user	Other Actors	
Use Case Overview			
Department user should be able to enter details of registered exporters which are relevant to the application.			
Pre-conditions			
1. User should have a valid login to the department application 2. Only the registered exporters' details should be entered			
Business Rules			
1. Only the approved exporters shall be entered into the system 2. Exporter registration number should be generated from the system in the format of 'D/COM/R/Company Registration No' (Reg. No should have 5 digits).			
Main Event List/Flow of Events			
1. User should be able to add registered exporters to the system by filling, all mandatory fields and clicking the 'Add' button. 2. The exporter registration number shall be generated for the new exporters through the system. 3. Once a new exporter is entered into the system, the username and password to login to the citizen application shall be generated and emailed to the exporter. A slip containing the user name and the password shall be generated, which can be printed and handed over/posted to the exporter by the department. 4. 'Modify' button should be enabled only when the form is loaded through the 'Manage Exporters' screen. In such case an existing exporters detail shall be loaded into the form and the user may apply relevant changes and save.			
Alternate Event List/Flow of Events			
1. User should be able to modify the exporter registration from the 'Manage Exporters' screen by clicking the relevant exporter's registration number link. Record will be updated when the user click on the 'Modify' button after the changes. 2. Message should be displayed stating 'Please enter all mandatory data', when click on the 'Add' button without entering all mandatory data. 3. All data fields should be cleared when clicked on the 'Reset' button 4. Message should be displayed stating 'Entered exporter registration number already exists', when enters a duplicate exporter registration number.			

2.3.2.2 Wireframe: Exporter Registration Form

EXPORTER REGISTRATION

DEPARTMENT OF COMMERCE
4th Floor, "Rakshana Mandiraya" No.21, Vauxhall Street, Colombo 02
REGISTRATION AS Form under Preferences Schemes

1. COMPANY NAME

2. BUSINESS REGISTRATION NO.:

3. EXPORTER REGISTRATION NO.:

4. CONTACT DETAILS

Official Address

Tel:

Fax:

E-mail:

Contact Person:

5. DETAILS OF THE PERSON WHO SUBMITS COO:

Name :

Mobile No:

Email:

Figure 14: Exporter Registration Form

2.3.2.3 Data Fields: Exporter Registration

Data	Data Type	Mandatory
Company Name	Text	yes
Business Registration No.	Text	yes
Exporter Registration No.	Text (system generated)	
Official Address	Text	
Telephone	Number	
Fax	Number	
Email	Text	yes
Contact Person	Text	
Name	Text	
Mobile Number	Number	yes
Email Address	Text	yes

Table 6 : Data Fields for Record Registered Exporters

2.3.3 Manage Exporters

2.3.3.1 Use Case: Manage Exporters

Use Case #/ID	05	Description	Manage exporters
Initiating Actor	Department user	Other Actors	
Use Case Overview			
Department user should be able to suspend, reactivate and modify exporters. User can also re-print the login credentials			
Pre-conditions			
1. User should have a valid login to the department application and should have been given access to the 'Manage Exporters' screen 2. Button label should be 'Suspend' for active exporters and 'Activate' for suspended exporters.			
Business Rules			
1. Password should be reset and new user account details should be printed for the selected exporter, when clicked on the 'Print Login Credentials' button. The new password should also be sent through email to the exporter. 2. Exporter should be able to be filtered from the registration number or exporter name. Field should display the exporter registration number.			
Main Event List/Flow of Events			
1. By default screen shall display the entire exporter list without any filtering 2. User shall be able to filter from the exporter registration number and/ or from the status 3. User shall be able to print the selected list and export the list to pdf/ excel 4. User shall be able to suspend or reactivate the exporters. Status should be updated accordingly. Suspended exporters will not be able to login to the citizen application. 5. User shall be able to print login credentials of the registered exporters. This will reset the existing password before printing the login credentials. The reset password shall be emailed to the exporter. 6. User can modify the registered exporter detail by clicking on the registration number which will load the detail of the selected exporter in the 'Exporter Registration' form.			
Alternate Event List/Flow of Events			

2.3.3.2 Wireframe: Manage Exporters

Manage Exporters

Exporter Reg. No./ Name ☐ Status

Reg. No	Business Name	Status	Login Credentials	Suspend
1000	ABC Ltd	Active		Suspend
1001	BCD Ltd	Suspended		Activate

Figure 15: Manage Exporters

Login Credentials

Exporter Registration No.: R1001

Business Name: ABC Ltd

You have been registered as an exporter in Department of Commerce.
Please follow the following instructions to access the eservices provided by the Department

1. Login to the Lanka Gate through (www.srilanka.lk)
2. Type 'Department of Commerce' in the search area and select the relevant service
3. Click Login and login to the eService with a personal social media account available to you
4. Enter the registered email address and the password given below to access the relevant services

Username: abc@slt.net
Password: PqS@123

Figure 16: Login Credentials Slip

2.3.3.3 Data Fields: Manage Exporters

Data	Data Type	Mandatory
Exporter Reg. No.	Text	
Business Name	Text	
Status	Text	

Table 7 : Manage Exporters

2.3.4 Record Cost Statement/ Affidavit

2.3.4.1 Use Case: Record Cost Statement/ Affidavit

Use Case #/ID	Case	Description	
	06		Record Cost Statement/ Affidavit
Initiating Actor	Department user	Other Actors	
Use Case Overview			
Department user shall be able to record approved cost statements and affidavits of the exporter.			
Pre-conditions			
1. User should have a valid login to the department application and should have given access to the screen			
Business Rules			
1. Cost statement number should be generated in the format of 'CS/DCOMR Company Registration No/ Scheme or Agreement/ Year/ Cost Statement No' (Cost statement No should have 4 digits). 2. Affidavit number should be generated in the format of 'AF/DCOMR Company Registration No/ Scheme or Agreement/ Year/ Affidavit No' (Affidavit No should have 4 digits). 3. Reminder email should be generated to the exporters' registered email addresses 2 weeks prior to the expiration of cost statements or affidavits.			
Main Event List/Flow of Events			
1. Department user shall select the type as 'New' in order to record new statement/ affidavit details. 2. Exporter should be able to fetch from the exporter registration number or from the exporter registered name 3. User may enter all the mandatory data and save the cost statement/ affidavit. The system shall generate the reference number for the cost statement/ affidavit which will be displayed to the user upon successful saving. 4. When select the 'Modify' mode only the 'Document Type', 'Statement/ Affidavit No.' and 'Valid Through' fields should be enabled. Based on the selected 'Document Type' and 'Statement/ Affidavit No.', other field values should be displayed. Only the expiry period of the statement/ affidavit can be modified.			
Alternate Event List/Flow of Events			
Email format for expiring cost statements and affidavits: <i>Dear Sir,</i> <i>Certificate of Origin/ Affidavit obtained by your company with the reference number bearing <COO No.>/ <Affidavit No.> due to be expired on <dd-mm-yyy></i> <i>Thank You,</i> <i>Department of Commerce, Sri Lanka</i>			

2.3.4.2 Wireframe: Record Cost Statement/ Affidavit

Cost Statement/ Affidavit Details

☒ New
 ☐ Modify

Document Type:

Statement/ Affidavit No.:

Exporter:

FTA:

HS Code:

Quantity: Unit:

Valid Through: to

Notes:

- Only the approved cost statements/ affidavits shall be entered into the system
- System generated statement/ affidavit number need to be recorded in the manual file for later identification
- SMS and email notifications shall be sent to the exporter informing the approval of the cost statement/ affidavit
- Same form can be used to extend the validity of the cost statement

Figure 17 : Record Cost Statement/ Affidavit

2.3.4.3 Data Fields: Record Cost Statements/ Affidavits

Data	Data Type	Mandatory
New/ Modify	Radio button	yes
Document Type	Drop down selection <Cost Statement/Affidavit>	yes
Statement/ Affidavit No.	Text (system generated)	
Exporter	Text	yes
FTA	Drop down selection	yes
Product (HS Code)	Text	yes
Quantity	Number	yes
Units	Drop down selection	yes
Validity Period	Date Selection	yes

Table 8 : Record Cost Statement/ Affidavit

2.3.5 Manage COOs

2.3.5.1 Use Case: Manage COOs

Use #/ID	Case	07	Description	Manage COOs
Initiating Actor	Department user/ Department Admin User	Other Actors		
Use Case Overview				
This function allows DoC to manage the COOs submitted through the citizen application				
Pre-conditions				
1. User should have a valid login to the department application and should have given access to the screen and relevant actions				
Business Rules				
1. There should be two user groups for the Department application namely 'Department User' and 'Department Admin'. Department user who has access to this function is only entitled to check the COOs in 'New' status. Department admin users will have access to the remaining activities.				
2. COO statuses should be able to be changed in the following order				
	Current Status	Next Possible Statuses		
01	New	Checked		
02	Checked	Approved/ Rejected/ Reverted		
03	Approved	Printed/ Cancelled		
04	Printed	Cancelled		
05	Request to Reprint	Reprinted/ Rejected		
06	Reprinted	Cancelled		
3. COO reference numbers should be generated from the system in the following format :				
No	Agreement/ Scheme	Country	Certificate No	
1	ISFTA	India	CO/ISFTA/Year/COO No	
2	PSFTA	Pakistan	CO/PSF/Year/COO No	
3	SAPTA	Afghanistan	CO/SP/AFG/Year/COO No	
		Bangladesh	CO/SP/BAN/Year/COO No	
		Bhutan	CO/SP/BHU/Year/COO No	
		India	CO/SP/IND/Year/COO No	
		Maldives	CO/SP/MAL/Year/COO No	
		Nepal	CO/SP/NEP/Year/COO No	
		Pakistan	CO/SP/PAK/Year/COO No	
4	SAFTA	Afghanistan	CO/SAF/AFG/Year/COO No	
		Bangladesh	CO/SAF/BAN/Year/COO No	
		Bhutan	CO/SAF/BHU/Year/COO No	
		India	CO/SAF/IND/Year/COO No	
		Maldives	CO/SAF/MAL/Year/COO No	
		Nepal	CO/SAF/NEP/Year/COO No	
		Pakistan	CO/SAF/PAK/Year/COO No	
5	APTA	Bangladesh	CO/BAN/Year/COO No	
		China	CO/CHI/Year/COO No	

6	EU-GSP	India	CO/IND/Year/COO No
		Laos	CO/LAO/Year/COO No
		S. Korea	CO/KOR/Year/COO No
		Austria	CO/AUS/Year/COO No
		Belgium	CO/BEL/Year/COO No
		Bulgaria	CO/BUL/Year/COO No
		Croatia	CO/CRO/Year/COO No
		Cyprus	CO/CY/Year/COO No
		Czech Republics	CO/CZE/Year/COO No
		Denmark	CO/DEN/Year/COO No
		Estonia	CO/ES/Year/COO No
		Finland	CO/FIN/Year/COO No
		France	CO/FRA/Year/COO No
		Germany	CO/GER/Year/COO No
		Greece	CO/GRE/Year/COO No
		Hungary	CO/HUN/Year/COO No
		Ireland	CO/IRE/Year/COO No
		Italy	CO/ITA/Year/COO No
		Latvia	CO/LAT/Year/COO No
		Lithuania	CO/LIT/Year/COO No
		Luxemburg	CO/LUX/Year/COO No
		Malta	CO/MLT/Year/COO No
		Netherlands	CO/NET/Year/COO No
		Poland	CO/POL/Year/COO No
		Portugal	CO/POR/Year/COO No
		Romania	CO/ROM/Year/COO No
		Slovakia	CO/SLR/Year/COO No
		Slovenia	CO/SLO/Year/COO No
		Spain	CO/SPN/Year/COO No
		Sweden	CO/SWE/Year/COO No
		UK	CO/UK/Year/COO No
	EU-GSP –Green Channel	Austria	GC/AUS/Year/COO No
		Belgium	GC/BEL/Year/COO No
		Bulgaria	GC/BUL/Year/COO No
		Croatia	GC/CRO/Year/COO No
		Cyprus	GC/CY/Year/COO No
		Czech Republics	GC/CZE/Year/COO No
		Denmark	GC/DEN/Year/COO No
		Estonia	GC/ES/Year/COO No
		Finland	GC/FIN/Year/COO No
		France	GC/FRA/Year/COO No
		Germany	GC/GER/Year/COO No
		Greece	GC/GRE/Year/COO No
		Hungary	GC/HUN/Year/COO No
		Ireland	GC/IRE/Year/COO No
		Italy	GC/ITA/Year/COO No
		Latvia	GC/LAT/Year/COO No
		Lithuania	GC/LIT/Year/COO No
		Luxemburg	GC/LUX/Year/COO No
		Malta	GC/MLT/Year/COO No
		Netherlands	GC/NET/Year/COO No
		Poland	GC/POL/Year/COO No
		Portugal	GC/POR/Year/COO No
		Romania	GC/ROM/Year/COO No
		Slovakia	GC/SLR/Year/COO No
		Slovenia	GC/SLO/Year/COO No
		Spain	GC/SPN/Year/COO No
		Sweden	GC/SWE/Year/COO No
		UK	GC/UK/Year/COO No

		EU GSP – Cross Regional (SAARC and ASEAN)	India	CO/GSP/IND/Year/COO No
			Pakistan	CO/GSP/PAK/Year/COO No
		EU GSP -Hub Operation		HO/Country Code/ Year/COO No
		Other GSP	Australia	CO/AUST/Year/COO No
			Belarus	CO/BLS/Year/COO No
			CIS	CO/CIS/Year/COO No
			Canada	CO/CAN/Year/COO No
			Japan	CO/JAP/Year/COO No
			New Zealand	CO/NZ/Year/COO No
			Norway	CO/NOR/Year/COO No
			Russian Federation	CO/RUS/Year/COO No
			Switzerland	CO/SWI/Year/COO No
			Turkey	CO/TK/Year/COO No
			USA	CO/USA/Year/COO No
		GSTP	Brazil	CO/BRA/Year/COO No
			Chile	CO/CHI/Year/COO No
			Iran	CO/IRA/Year/COO No
			Mexico	CO/MEX/Year/COO No
			Peru	CO/PER/Year/COO No

4. Every action shall be recorded with a comment, user, date and time for transaction logging purposes

Main Event List/Flow of Events

- Records can be filtered by FTA, Exporter, COO Code, Temporary reference number, status and the period.
- Relevant COO shall be displayed when the temporary reference no link is clicked.
- 'Print' button should enable only for the 'Approved' and 'Printed' COOs.
- Once the Edit button is clicked in any row, the system shall record that the relevant COO is being processed by a user and any other users will not be able to work on such COOs. The system shall disable such rows that are being worked on by another user. Login user name will be displayed in the 'Taken By' field, when another user clicks on the 'Edit' button.
- New COOs submitted by the exporter will be checked by a department user. Department user can only check the data in COOs in the 'New' status by clicking the 'Temp. Ref. No.'. The user may click on the Edit button to start working on the COO and change the status to 'Checked' and Save the record. Status of the COO will be changed to 'Checked' and will be removed from the users who are in the checking level (department user). A comment need to be provided at the time of saving.
- Once a COO is checked, then the same shall be available for the Department Admin users for approval, revert or reject.
- The department admin may select 'Revert'; provide a comment to save to inform the user of any changes required to the application. System will send an email to the exporter with the comment and the temporary reference number to the COO. Exporters can use the temporary reference number to access the application and make adjustments through the citizen application.
- Department admin may 'Approve' the application with a comment. The COO reference number shall be generated accordingly and the exporter will be informed through and email with the COO reference number.
- Department admin may 'Reject' the application with a comment. The COO application shall be marked as a rejected application and an email shall be sent to the exporter informing that the application has got rejected.

10. Records need to be saved after every action change by inserting a comment.
11. Only the approved COOs can be printed by Department Admin. 'Exporter copy' and 'Office copy' can be printed separately by selecting the relevant copy type from the pop-up. Status will be automatically changed to 'Printed' after confirming the print by selecting the copy type and number of copies'
12. When an exporter request for copies of a particular COO; it will appear in the 'Manage COO' screen with the status 'Request to Reprint'. Department Admin will reprint the requested number of copies by changing the action to 'Reprint'. Status will be changed to 'Reprinted', after confirming the print request by selecting the copy type and number of copies'. Number of copies shall be automatically displayed based on the number of copies requested by the exporter.
13. 'Action History' will pop up when clicked on the 'History' button. The action history shall display the action, user, date and comments.
14. Department Admin can cancel an approved COO by changing the action to 'Cancel'. Status will be changed to 'Cancelled' after that.

Alternate Event List/Flow of Events

1. Only the cancelled COOs should be loaded for reapplication in COO application
2. Comment entered by the DoC users should display in the 'Action History'.
3. Emails and SMS should be generated to the relevant exporters in the following format, when the department user approve, reject or revert the COO application.

Email format Approved COO:

Dear Sir,

With reference to the certificate of origin application submitted on <submit date> with the temporary reference number <temp number> has been <approved> by the Department of Commerce. The assigned reference number for the certificate of origin is <Ref. N.o>

Comment:
<comment>

Thank You,
Department of Commerce, Sri Lanka
Please call 1919 if you have any queries.

Email format Reverted COO:

Dear Sir,

With reference to the certificate of origin application submitted on <submit date> with the temporary reference number <temp number> has been <reverted> by the Department of Commerce. Please make the required adjustments as mentioned in the below comments and resubmit your application.

Comment:
<comment>

Thank You,
Department of Commerce, Sri Lanka
Please call 1919 if you have any queries.

Email format Rejected COO:

Dear Sir,

With reference to the certificate of origin application submitted on <submit date> with the temporary reference number <temp number> has been <rejected> by the Department of Commerce. Please refer the comments mentioned below.

Comment:

<comment>

Thank You,

Department of Commerce, Sri Lanka

Please call 1919 if you have any queries.

SMS format COO status changes:

COO application submitted with the temp. ref. no. <temp number> has been <status> by the DoC. Please check your registered email address for details.

2.3.5.2 Wireframe: Manage COOs

Manage COOs

FTA:

Exporter:

COO Code:

Status:

Temp. Ref #:

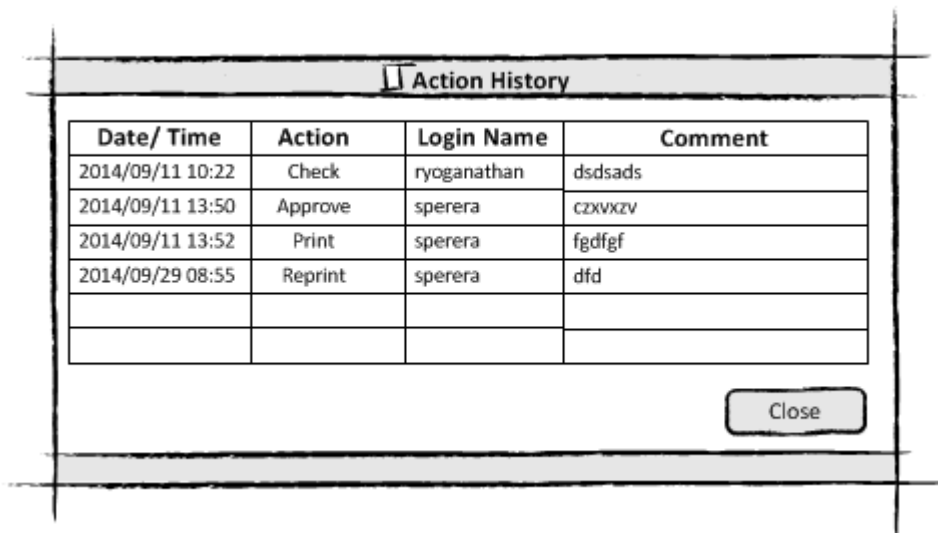
Duration: to

Temp Ref #	Date	COO Code	Exporter Reg. No.	Exporter Name	Status	Delivery Mode	Action	Taken By	Edit	Save	Print	Cancel	History
T/GST/0001	2014/09/11		101/2006	A B C Pvt Ltd	New	Post	Check	sperera					
T/PSFTA/0001	2014/09/11	COO101	105/2034	D E F Pvt Ltd	Approved	Office	Approve	asilva					
							Reject						
							Revert						
							Reprint						

Figure 18 : Manage COOs



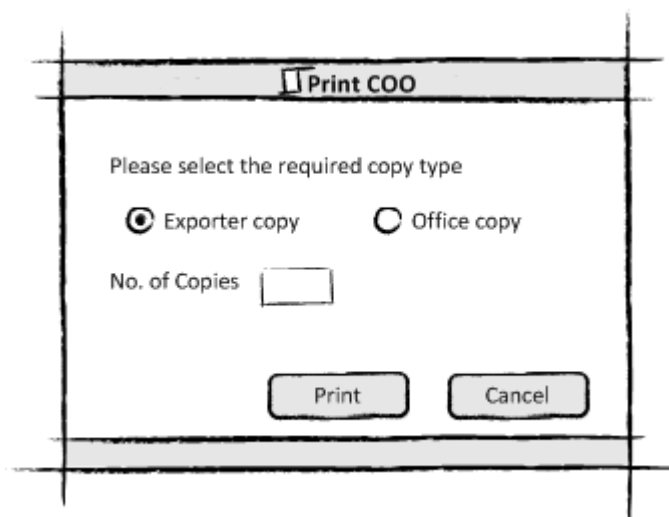
Manage COO.pdf



The 'Action History' popup features a title bar with a close icon and the text 'Action History'. Below the title bar is a table with four columns: 'Date/ Time', 'Action', 'Login Name', and 'Comment'. The table contains four rows of data, followed by two empty rows. A 'Close' button is located at the bottom right of the popup.

Date/ Time	Action	Login Name	Comment
2014/09/11 10:22	Check	ryoganathan	dsdsads
2014/09/11 13:50	Approve	sperera	czxvxzv
2014/09/11 13:52	Print	sperera	fgdfgf
2014/09/29 08:55	Reprint	sperera	dfd

Close

Figure 19: Action History -Popup

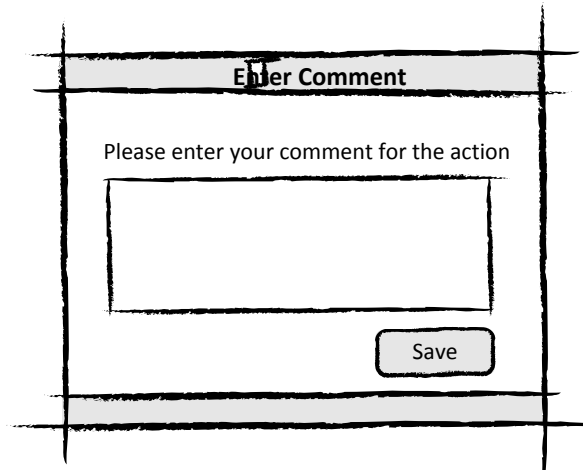
The 'Print COO' popup has a title bar with a close icon and the text 'Print COO'. The main content area contains the instruction 'Please select the required copy type' followed by two radio buttons: 'Exporter copy' (selected) and 'Office copy'. Below this is a text input field labeled 'No. of Copies'. At the bottom, there are 'Print' and 'Cancel' buttons.

Please select the required copy type

☒ Exporter copy ☐ Office copy

No. of Copies

Print Cancel

Figure 20: Print COO Confirmation

The 'Enter Comment' popup has a title bar with a close icon and the text 'Enter Comment'. The main content area contains the instruction 'Please enter your comment for the action' followed by a large text input field. A 'Save' button is located at the bottom right.

Please enter your comment for the action

Save

Figure 21: Action Comments - Popup

2.3.5.3 Data Fields: Manage COO

Data	Data Type	Mandatory
Manage COO		
FTA	Drop down selection	
Exporter	Fetch from Exporter Registration number and name	
COO Code	Fetch from COO Code	
Status	Drop down selection.	
Temp. Ref. No.	Fetch from temporary reference number	
Duration	Date selection	
Action	Drop down selection	
Validity Period	Date Selection	
Print COO		
Copy Type	Radio Button (Exporter Copy/ Office Copy)	
No. of copies	Text	
Enter Comment		
Comment Box	Text	

Table 9: Manage COO

2.3.6 Print COO

2.3.6.1 Use Case: Print COO

Use Case #/ID	o8	Description	Print COO
Initiating Actor	Department Admin user	Other Actors	
Use Case Overview			
This function defines the rules in printing the COOs/ copies. Printing COO function is called through the 'Print' button available in the Manage COO function.			
Pre-conditions			
1. User should have a valid login to the department application and should have given access to print COOs			
Business Rules			
1. System shall maintain several templates for printing the COO. The relevant template will be set up with the FTA. 2. The COO shall be printed on a pre-printed standard security paper for the FTA. User will need to feed the correct pre-printed form before printing the COO.			
Main Event List/Flow of Events			
1. System shall fetch the relevant template for the FTA of which the COO is being printed. 2. Data to the COO shall be loaded with the information provided by the exporter in the COO application. 3. 'For Official Use' section (section 4) should be printed only in the office copies. 4. The first print of the COO shall be marked as 'ORIGINAL' 5. The word 'DUPLICATE' should be printed in the subsequent exporter copies of COOs after the first print.			
Alternate Event List/Flow of Events			
N/A			

2.3.8 Annual Quota Allocation

2.3.8.1 Use Case: Annual Quota Allocation

Use Case #/ID	Case	Description	
	09		Allocate annual quota to requested exporters
Initiating Actor	Department user	Other Actors	
Use Case Overview			
DoC should be able to allocate quota for a product to a requested exporters			
Pre-conditions			
1. User should have a valid login to the department application and should have given access to the screen and relevant actions			
Business Rules			
1. Only the approved quota shall be allocated in the system 2. Quota allocation is valid for a calendar year 3. Quota allocation cannot be greater than the 'Remaining Quota'			
Main Event List/Flow of Events			
1. User can allocate quota for a requested exporter for a requested product by analysing the past performance of the exporter 2. By default current year should be displayed for the 'Year'. 3. 'Remaining Quota' should be displayed according to the selected year, FTA and HS Code. 4. Quota allocation history should be able to be viewed by clicking on the 'Allocation Details' link. If the user clicks on the 'Allocation Details' link without selecting 'FTA' and 'HS Code', message needs to be displayed stating 'Please select a FTA and a HS Code to view allocation details'. 5. Quota allocation amount cannot be greater than the remaining quota. 6. 'Year' drop down selection in 'Allocation History' should make available the last 10 years 7. Quota allocation details should be saved when click on the 'Save' button			
Alternate Event List/Flow of Events			
N/A			

2.3.8.2 Wireframe: Annual Quota Allocation

T
Quota Allocation

Annual Quota Allocation

Year

FTA

HS Code

Remaining Quota

Exporter

Allocation

[Allocation Details](#)
Save
Cancel

Quota Allocation Details

Year

Total Allocation

Exporter Registration Code	Exporter Name	Exported units	Allocated Units
Total			

Remaining Units

Close

Figure 22 : Annual Quota Allocation

2.3.8.3 Data Fields: Annual Quota Allocation

Data	Data Type	Mandatory
Year	Drop down selection	Yes
FTA	Drop down selection	Yes
HS Code	Fetch from HS Codes	Yes
Exporter	Fetch from Exporter Registration number and name	Yes
Allocation	Number	Yes

Table 10 : Annual Quota Allocation

2.3.9 Daily Transaction Report

2.3.9.1 Use Case: Daily Transaction Report

Use Case #/ID	10	Description	Display payment transaction details
Initiating Actor	Department User	Other Actors	
Use Case Overview			
DoC users will be able to view payment transaction details for daily reconciliation purposes			
Pre-conditions			
1. User should have a valid login to the department application and should have given access to the screen and relevant actions			
Business Rules			
1. The report can be extracted for a particular date, date range, one or all payment modes, one or all statuses, one or all payment gateways. 2.			
Main Event List/Flow of Events			
1. By default, data for the current date should be displayed for 'From' and 'To'. 2. Records should be displayed based on the date in descending order (latest on top). 3. User should be able to filter data from period, payment mode, status and payment gateway 4. Receipt number shall be available only for the manual applications and the transaction reference number shall be available only for online applications. 5. Payment mode shall be 'Cash' for the manual applications and 'Online' for online transactions 6. Convenience fee shall be applicable only for online transactions 7. User should be able to print or export data to excel based on the selected criteria.			
Alternate Event List/Flow of Events			
N/A			

2.3.9.2 Wireframe: Daily Transaction Report

Figure 23 : Daily Transaction Report



Daily Transaction
Report.pdf

2.3.9.3 Data Fields: Daily Transaction Report

Data	Data Type	Mandatory
Date	Date selection	
Payment Mode	Drop down selection	
Status	Drop down selection	
Payment Gateway	Drop down selection	

Table 11 : Daily Transaction Report

2.3.10 Exports/ FTA Statistics Report

2.3.10.1 Use Case: Exports/ FTA Statistics Report

Use Case #/ID	11	Description	Display export statistics
Initiating Actor	Department User	Other Actors	
Use Case Overview			
DoC users should be able to view performance of a selected FTA, exporter, product and view export details based on the selected criteria.			
Pre-conditions			
1. User should have a valid login to the department application and should have given access to the screen and relevant actions			
Business Rules			
1. The report can be extracted for a date range, all or one FTA, all or one country, all or one product, all or one exporter OR a combination of any of these criteria			
Main Event List/Flow of Events			
1. By default current date should be displayed for 'From Date' and 'To Date' and data should be displayed accordingly. 2. Records should be displayed based on the date in descending order (latest on top). 3. User should be able to filter data from period, FTA, export country, product code and exporter 4. Export country selection list should display the countries that have FTA agreements. 5. Field values will display according to the exporter inserted values in COO application. 6. Total value should be display for 'Quantity' and 'FOB Value (USD)' fields irrespective of the HS code and unit type. 7. User should be able to print or export data to excel based on the selected criteria.			
Alternate Event List/Flow of Events			
N/A			

2.3.10.2 Wireframe: Exports/ FTA Statistics Report

Statistics

Exports/ FTA Statistics

From Date To Date

FTA Exporting Country

Product Code Exporter

Date	FTA	Exporting Country	Exporter Name	HS Code	Unit	Quantity	FOB Value (USD)

Total

Figure 24 : Exports/ FTA Statistics Report

2.3.10.3 Data Fields: Exports/ FTA Statistics Report

Data	Data Type	Mandatory
Date	Date selection	
FTA	Drop down selection	
Exporting Country	Drop down selection	
HS Code	Fetch	
Exporter	Fetch from Exporter registration number	

Table 12 : Exports/ FTA Statistics Report

2.4 Non Functional Requirements

All eServices developed shall comply with the Non Functional requirements (Security, Auditing and Performance) as described in the Annex 2 of RFP and “The Lanka Gate Initiative – Overall Architecture and Design” and the subsequent responses to clarifications.

No Exceptions to the above has been identified at the time of compilation of this document other than the following.

- Citizen application implemented through LankaGate shall only be in English
- No audit logs will be maintained for the retrieval of data.
- The eService design should consider maximum performance levels considering;
 - response time for the citizen application form loading and submission
 - high availability for the department/ web applications as the department processes are carried out through the eService
 - Current load approximately 500 COOs issued per day
 - Concurrent usage of minimum 10 users anticipated for both the citizen application as well as the department application
- Performance Requirements:

Screen Navigation performance: field-to-field	< 10 milliseconds
Screen Navigation performance: screen-to-screen	< 5 milliseconds
Screen Refresh performance	< 3 milliseconds
Screen list box, combo box performance	< 3 milliseconds
Screen grid – 25 rows, 10 columns performance	< 5 milliseconds
Simple enquiry performance– single table, 5 fields, 3 conditions – without screen rendering	< 5 seconds for 50,000 rows
Complex enquiry performance– multiple joined table (3), 10 fields, 3 conditions – without screen rendering	< 8 seconds for 50,000 rows
Server side validations / computations performance	< 10 milliseconds
Client side validations / computations performance	< 1 milliseconds
Batch processing (if any) per 100 records performance	<120 seconds
Login, authentication, and verification performance	< 3 seconds
Daily backups (@ Dept.) – max duration performance	1 hour
Total Restore (@Dept) – max duration performance	4 hours

Table 13 : Performance Requirements

3 Function Point Analysis

3.1 Summary

Project Identification		
Customer Name	ICT Agency of Sri Lanka	
Project Name	eServices Development 2014	
Project Code	ICTA/MT/CS20/FBS/235	
Department	Department of Commerce	
Date	February 17, 2015	
Summary of Estimates		
Unadjusted Function Point Count	155	From FP worksheet
Processing Complexity Adjustment Factor	1	From PCA worksheet
Adjusted Function Point Count (AFP)	155	Calculated: (FP*PCA)

Table 14 : Function Point Summary

3.2 Detail Function Point Calculation

3.2.1 Unadjusted Function Point Count

Function Type	Functional Complexity	Count	Weight	Function Points (FPs)	FP %
Internal Logical Files (ILFs)	Low	9	7	63	41%
	Average	0	10	0	
	High	0	15	0	
External Interface Files (EIFs)	Low	2	5	10	6%
	Average	0	7	0	
	High	0	10	0	
External Inputs (EIs)	Low	4	3	12	26%
	Average	1	4	4	
	High	4	6	24	
External Outputs (EOs)	Low	2	4	8	5%
	Average	0	5	0	
	High	0	7	0	
External Queries (EQs)	Low	10	3	30	22%
	Average	1	4	4	
	High	0	6	0	
Total Unadjusted Function Point Count				155	100%

Table 15 : Unadjusted FP Count

* Detail breakdown of the function points calculated above is demonstrated in the next section of this document.

3.2.2 Internal Logical Files (ILFs)

List of files	DETs	RETs	Low	Average	High	Notes and Assumptions
FTA	8	1	1	0	0	Holds the master data for FTAs
Exporters	11	1	1	0	0	Exporter registration detail
Cost Statement	12	1	1	0	0	Cost statement/ affidavits
COO	33	1	1	0	0	COO applications and processing
Payments	10	1	1	0	0	Payment detail
Requests	5	1	1	0	0	COO and copy requests
Quota	5	1	1	0	0	Annual quota allocation
HSCodes	4	1	1	0	0	Product master
Countries	4	1	1	0	0	Country master
Summary			9	0	0	

Table 16: ILFs

3.2.3 External Interface Files (EIFs)

List of files	DETs	RETs	Low	Average	High	Notes and Assumptions
LGPS	7	1	1	0	0	service code, trn ref #, amount, return url, convenience fee, pgname, status
Common Admin	4	1	1	0	0	user name, password, department, response
Summary			2	0	0	

Table 17: EIFs

3.2.4 External Inputs (EIs)

List of inputs	DETs	FTRs	Low	Average	High	Notes and Assumptions
Exporter Registration	15	1	1	0	0	14 UI elements + 1 message + 1 email/ FTR - Exporter
Manage Exporters	9	1	1	0	0	9 UI elements/ FTR - Exporter
Submit Cost Statement	16	4	0	0	1	15 UI elements + 1 message/ FTR - Exporter, FTA, HSCode, Cost Statement
Approve COO	22	3	0	0	1	20 UI elements + 1 message + 1 email/ FTR - FTA, Exporter, COO
Annual Quota Allocation	21	4	0	0	1	19 UI elements + 1 message/ FTR - FTA, HSCode, Exporter, Quota
Department Login (common module)	6	1	1	0	0	5 UI elements + 1 message/ FTR - Common admin
Reset Password (common module)	7	1	1	0	0	6 UI elements + 1 message/ FTR - common admin
COO Application (Exporter)	41	4	0	0	1	40 UI elements + 1 message/ FTR - Exporter/ FTA/ HSCode/ COO
Request COO Copies	15	2	0	1	0	16 UI elements + 1 message (but considered only 15) / FTR - COO, Requests
Summary			4	1	4	

Table 18: EIs

3.2.5 External Outputs (EOs)

List of Outputs	DETs	FTRs	Low	Average	High	Notes and Assumptions
Daily Transaction Report	17	1	1	0	0	17 UI elements/ only 1 FTR is counted to simplify the FP count
Statistics Report	16	1	1	0	0	16 UI elements/ only 1 FTR counted to simplify the FP count
Summary			2	0	0	

Table 19: EOs

3.2.6 External Queries (EQs)

List of Queries	# of DETs	# of FTRs	Cmplxty	Low	Average	High	Notes and Assumptions
Print username/ pwd (Exporter)	5	1	Low	1	0	0	5 UI elements/ FTR - Exporter
Department Home	2	2	Low	1	0	0	Links, Notifications/ FTR - Common admin, COO
Payment Confirmation	7	1	Low	1	0	0	7 UI elements/ FTR - LGPS
Payment Receipt	12	1	Low	1	0	0	12 UI elements/ FTR -Payments
Exporter Dashboard	7	2	Avg	0	1	0	7 UI elements/ FTR - COO/ Common admin
Print COO (Template 1)	1	1	Low	1	0	0	DETs not counted purposely to make the EQ low
Print COO (Template 2)	1	1	Low	1	0	0	
Print COO (Template 3)	1	1	Low	1	0	0	
Print COO (Template 4)	1	1	Low	1	0	0	
Print COO (Template 5)	1	1	Low	1	0	0	
Print COO (Template 6)	1	1	Low	1	0	0	
Summary				10	1	0	

Table 20: EQs

3.2.7 Value Adjustment Factor (VAF)

General Systems Characteristics		Degree of Influence (0-5)	Description
1.	Data Communications	4	Application is more than a front-end, but supports only one type of TP communications
2.	Distributed Processing	3	Distributed processing and data transfer are on-line and in one direction
3.	Performance	4	In addition, stated user performance requirements are stringent enough to require performance analysis tasks in the design phase
4.	Heavily Used Configuration	3	Specific processor requirements for a specific piece of the application are included
5.	Transaction Rates	3	Daily peak transaction period is anticipated
6.	Online Data Entry	4	24% to 30% of transactions are interactive.
7.	Design for End User Efficiency	3	Six or more of the above, but there are no specific user requirements related to efficiency
8.	Online Update	3	Online update of major internal logical files is included
9.	Complex Processing	1	Sensitive control and/or application-specific security processing.
10.	Usable in Other Applications	1	Re-usable code is used within the application
11.	Installation Ease	1	No special considerations were stated by the user but special setup is required for installation
12.	Operational Ease	2	Start-up, back-up, and recovery processes were provided, but human intervention is required. The application minimizes the need for paper handling.
13.	Multiple Sites	0	User requirements not require considering the needs of more than one user/installation site
14.	Facilitate Change	3	Flexible query and report facility is provided that can handle simple requests. (count as 1 item) Business control data is kept in tables that are maintained by the user with on-line interactive processes, and the changes take effect immediately. (count as 2 items)
Total Degree of Influence (TDI)		35	<i>Calculated (sum of the above)</i>
Value Adjustment Factor (VAF)		1.00	<i>Calculated $((TDI*0.01)+0.65)$</i>

Table 21: Value Adjustment Factor

4 e-Services Implementation Plan



Figure 25 : eService Implementation Plan

5 Operational and Back Office Support Requirements from DoC and ICTA

1. DOC to take necessary actions on regularizing the new process of Certificate of Origin (COO) issuance before the eService is implemented.
2. DOC needs an internet connection to connect to the web application hosted in the Lanka Government Network (LGN) of ICTA.
3. DOC shall have necessary infrastructure and connectivity to connect to both the department application as well as the citizen application
4. DOC shall have all the pre-printed forms ready for the application to be launched
5. DOC shall appoint users and assign responsibilities. Department level administrator is required to maintain accessibility and other administrative functions related to the DOC department eServices.
6. DOC understands that the user who approves the COO through the application shall be the officer who signs the COO
7. DOC shall make the necessary printers available to print the COO applications as per the requests coming through the application
8. DOC needs to have the necessary forms and process in place for the exporter registration and approving cost statements or affidavits.
9. DOC needs to communicate to the exporters regarding the new process of applying for COOs and requesting copies.
10. DOC is aware that all email and sms communications with exporters shall be made with the contact information available in the exporter registration.
11. ICTA and DOC shall improve the awareness of the exporters on the availability of the eServices and take necessary action to improve the usage.
12. DOC is aware that the cost of SMSs being sent as an output of certain eServices has to be borne by the Department.

6 Acceptance Criteria for Deliverables

All documents delivered shall only be subjected to two review cycles prior to acceptance.

Deliverable	Expected Delivery Date	Expected Acceptance Date	Remarks
eService Implementation Proposal	10 Oct 2014	22 Oct 2014	
DOC eServices Design Document	10 Oct 2014	20 Oct 2014	
Release Management Plan	10 Oct 2014	20 Oct 2014	
Installation Guide	04 Nov 2014	14 Nov 2014	
User Manual	04 Nov 2014	14 Nov 2014	
Administration Manual	04 Nov 2014	14 Nov 2014	
User Acceptance Test	06 Nov 2014	06 Nov 2014	
Operational Acceptance	12 Nov 2014	12 Nov 2014	

Table 22 : Acceptance Criteria

7 *Sign off*

Acceptance

We confirm that the application functionalities defined in this document meets our requirements and here by accept the SRS.

Department of Commerce

Name:

Designation:

Signature:

Information Communication Technology Agency (ICTA), Sri Lanka

Name:

Designation:

Signature: