**Volunteer Management System**

|  |  |
| --- | --- |
| ***Function Point Counter*** |  |
|  |  |
|  |  |
| **FPC for VMS** |  |
|  |  |
| **Feng Yan** | **A0065905** |
| **Hnin Nu Aye** | **A0005937** |
| **Jiang Jifa** | **A0065734** |
| **Liu Peishan** | **A0065963** |
| **PHUNG KIM CUONG** | **A0065998** |
| **Thida Khin Myo Thaung** | **A0005954** |
| **Zaw Htet** | **A0065880** |
|  |  |
|  |  |
|  |  |

|  |
| --- |
| Volunteer Management System  Function Point Counter |

Version: 0.1

Prepared by: Dio Phung

Date: 26rd March 2011

© 2011 ISS.

The information contained in this document is the property of ISS. The contents must not be reproduced, wholly or in part, for purposes other than for which it has been supplied, without the prior permission of ISS, or, if it has been furnished under contract to another party, as expressly authorized under that contract. ISS shall not be liable for any errors or omissions.

**Document History**

|  |  |  |  |
| --- | --- | --- | --- |
| Version | Author | Reviewed by | Date |
| 0.1 | Dio Phung |  | 26th March 2011 |
| 0.1b | Jiang Jifa |  | 28th March 2011 |

**Distribution List**

|  |  |  |
| --- | --- | --- |
| Name | Department | Organization |
|  |  |  |
|  |  |  |
|  |  |  |

Table of contents

[**I.** **Data functions** 5](#_Toc289517772)

[**II.** **Transactional Functions** 8](#_Toc289517773)

[**III.** **Unadjusted Function Point Count Summary** 11](#_Toc289517774)

[**IV.** **Calculate Value Adjustment Factor** 12](#_Toc289517775)

[**V.** **ADJUSTED FUNCTION POINT COUNT SUMMARY** 12](#_Toc289517776)

1. **Data functions**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Internal Logical File/External Interface File** | | | | **Element of complexity** | |  |
| # | Type | Reference | Description | DET | RET | Complexity |
| 1 | ILF | 2.3.1 | **Volunteer Account:**   * Title( Mr. , Mrs. , Ms, Dr, Other) * First Name * Last Name * Address * Country * Email Address (Read Only Field) * Phone(Home) * Phone(Mobile) * Date of Birth * Hobbies/ Interests * Special Skills * Qualifications attained (Education) * Qualifications attained (Others) * Languages * Volunteer Interests (Admin, Befriending, Events (organizing), General Services, IT, Research, Marketing/Publicity, Skilled Services, Others) * Join Date(Read Only) | 16 | 1 | L |
| 2 | ILF | 2.3.19 | **Project**:   * Name * Location * Project introduction * Start date * End date * Status (Finished/in progress/ Coming) | 7 | 1 | L |
| 3 | ILF | 2.3.6 | **Feedback**:   * Author * Content * Created Time * Status (approved/not approved) | 4 | 1 | L |
| 4 | ILF | 2.3.7 | **Story/Experience**   * Author * Topic * Content * Created Date * Status ( approved/not approved) | 5 | 1 | L |
| 5 | ILF | 2.3.8 | **Project Preference (of volunteer):**   * Volunteer Name * Preference details. | 2 | 1 | L |
| 6 | ILF | 2.3.32 | **Request for certificate:**   * Requestor (Volunteer name) * Project name * Authorizer (the authority to approved this request) * Created Date. | 4 | 1 | L |
| 7 | ILF | 2.3.11 | **Staff account:**   * Title( Mr. , Mrs. , Ms, Dr, Other) * First Name * Last Name * Address * Country * Email Address (Read Only Field) * Phone(Home) * Phone(Mobile) * Date of Birth * Job Title * Role(Read Only Field) * Join Date | 12 | 1 | L |
| 8 | ILF | 2.3.18 | **Project Proposal:**   * Author / Proposer * The approving authority * Proposal details * Created date * Status of proposal. | 5 | 1 | L |
| 9 | ILF | 2.3.25 | **Itinerary:**   * Project ID * Start date * End date * Itinerary details (when do what, by whom) * Status (approved/not approved). | 5 | 1 | L |
| 10 | ILF | 2.3.24 | **Project Progress:**   * Expected Start date * Expected End date * Actual Start date * Actual End date * Status. | 5 | 1 | L |
| 11 | ILF | 2.3.23 | **Project Calendar:**   * Project name * Calendar details. | 2 | 1 | L |
| 12 | ILF | 2.3.32 | **Certificate:**   * Certificate name * Volunteer name * Project name * Certificate content. | 4 | 1 | L |
| 13 | ILF | 2.3.35 | **System parameter:**   * Parameter name * Parameter value | 2 | 1 | L |

1. **Transactional Functions**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **External Input (EI)/ External Output (EO)/External Enquiry (EQ)** | | | | **Element of complexity** | |  |
| # | Type | Reference | Description | DET | FTR | Complexity |
|  | EI |  | **Register Volunteer Account:**   * User name * Password * DOB * Email * Phone | 5 | 1 | L |
|  | EI |  | **Update Volunteer Profile:** | 5 | 1 | L |
|  | EI |  | **Retrieve Forgotten Password** | 2 | 1 | L |
|  | EI |  | **Change Password** | 2 | 1 | L |
|  | EI |  | **Post Feedback to Project**:   * Created By * For which project * Content * Created Time * Status (approved/not approved). | 5 | 1 | L |
|  | EI |  | **Share Experience and Inspiring stories:**   * Author * Topic * Content * Created Date * Status ( approved/not approved) | 5 | 1 | L |
|  | EI |  | **Raise Interest to Project**   * Volunteer Name * Preference details | 2 | 1 | L |
|  | EI |  | **Send Request for Certificate**   * Requestor (Volunteer name) * Indicated project * Authorizer (the authority to approved this request) * Created Date | 4 | 1 | L |
|  | EI |  | **Delete/Deactivate Volunteer Account** | 5 | 1 | L |
|  | EI |  | **Register Staff Account By Admin**   * Staff name * Password * Department * Position / Role (Project director, PM, lead…etc.) * DOB * Mobile phone * Email | 7 | 1 | L |
|  | EI |  | **Update Profile By Staff** | 7 | 1 | L |
|  | EI |  | **Retrieve Forgotten Password** | 2 | 1 | L |
|  | EI |  | **Change password** | 2 | 1 | L |
|  | EI |  | **Manage Staff Role** | 2 | 1 | L |
|  | EI |  | **Delete/ Deactivate Staff Account** | 7 | 1 | L |
|  | EI |  | **Propose Project**   * Author / Proposer * The approving authority * Proposal details * Created date * Status of proposal | 5 | 1 | L |
|  | EI |  | **Approve/Reject project proposal** | 5 | 1 | L |
|  | EI |  | **Setup project details**   * Name * Location * Start date * End date * Status | 5 | 1 | L |
|  | EI |  | **Invite Volunteer By Email** | 10 | 2 | A |
|  | EI |  | **Assign project member and roles** | 6 | 2 | A |
|  | EI |  | **Setup itinerary plan** | 5 | 1 | L |
|  | EI |  | **Setup project calendar**   * Project name * Calendar details | 2 | 1 | L |
|  | EI |  | **Update project progress**   * Expected Start date * Expected End date * Actual Start date * Actual End date * Status | 5 | 1 | L |
|  | EI |  | **Prepare Itinerary Plan**   * Project ID * Start date * End date * Itinerary details (when do what, by whom) * Status (approved/not approved) | 5 | 1 | L |
|  | EI |  | **Submit Itinerary Plan** | 5 | 1 | L |
|  | EI |  | **Approve/Reject Itinerary Plan** | 5 | 1 | L |
|  | EI |  | **Upload Certificate Template**   * Certificate name * Volunteer name * Certificate content * Project name | 4 | 1 | L |
|  | EI |  | **Request certificate by volunteer** | 4 | 1 | L |
|  | EI |  | **Configure System Parameter**   * Parameter name * Parameter value | 2 | 1 | L |

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **External Input (EI)/ External Output (EO)/External Enquiry (EQ)** | | | | **Element of complexity** | |  |
| # | Type | Reference | Description | DET | FTR | Complexity |
|  | EQ |  | **Logon**  **Input:**   * ID * Password   **Output:**   * Security level | 2  1 | 1  1 | L |
|  | EQ |  | **Browse for project**  **Input:**   * Start date * Location   **Output:**   * Name * Location * Start date * End date * Status | 2  5 | 1  1 | L |
|  | EQ |  | **Display Volunteer Account**  **Input:**   * Volunteer name   **Output:**   * User name * DOB * Role (Team lead/member) * Address * Email * Phone | 1  7 | 1  1 | L |
|  | EQ |  | **Display Staff Account**  **Input:**   * Staff name   **Output:**   * Staff name * Department * Position / Role (Project director, PM, lead…etc.) * DOB * Mobile phone * Email | 1  7 | 1  1 | L |
|  | EQ |  | **Project Tracking Report**  **Input:**   * Project ID   **Output:**   * Project calendar * Project itinerary * Project progress | 1  3 | 1  1 | L |
|  | EQ |  | **Volunteer Specific Report**  **Input:**   * Volunteer name   **Output:**   * No of Projects participated in * No of days spend in each project * Position in each project * Project preference | 1  5 | 1  1 | L |

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **External Input (EI)/ External Output (EO)/External Enquiry (EQ)** | | | | **Element of complexity** | |  |
| # | Type | Reference | Description | DET | FTR | Complexity |
|  | EO |  | **New password email**   * User name * New password * Hyperlink to activate new password | 3 | 1 | L |
|  | EO |  | **Volunteer Email invitation**   * Project name * Project details * Hyperlink to join project | 3 | 1 | L |
|  | EO |  | **Generated Certificate**   * Certificate name * Volunteer name * Project name * Certificate content | 4 | 1 | L |

1. **Unadjusted Function Point Count Summary**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **ITEM** | **LOW** | **AVERAGE** | **HIGH** | **TOTAL** |
| External Input | 27x3=81 | 2x4=8 | 0x6=0 | 89 |
| External Output | 3x4=12 | 0x5=0 | 0x7=0 | 12 |
| Internal File | 13x7=91 | 0x10=0 | 0x15=0 | 91 |
| Interface File | 0x5=0 | 0x7=0 | 0x10=0 | 0 |
| External Inquiry | 6x3=18 | 0x4=0 | 0x6=0 | 18 |
| Unadjusted Function Points | | | | 210 |

1. **Calculate Value Adjustment Factor**

|  |  |  |
| --- | --- | --- |
| **CHARACTERISTIC** | **DI** | **Reasons** |
| Data Communications | **2.5** | VMS is an online system with moderate number of users |
| Distributed Functions | **2** | The system will be built with multi-tier architecture where system components will be on different boxes |
| Performance | **1** | There is no special requirements for performance |
| Heavily Used Configuration | **0** | Configuration not mentioned in the URS |
| Transaction Rate | **1** | There are only moderate number of end users |
| On-Line Data Entry | **2.5** | System is an online system which deal moderately with data input |
| End User efficiency | **2** | There are no special requirements of end user efficiency except for some browsers support |
| On-line Update | **2** | System is an online system which deal moderately with data update |
| Complex Processing | **1** | There is no complicated processing of data in VMS |
| Re-usability | **2** | The code should be moderately reusable |
| Installation Ease | **0** | It is not mentioned in the URS |
| Operational Ease | **0** | It is not mentioned in the URS |
| Multiple Sites | **0** | It is not mentioned in the URS |
| Facilitate Change | **1** | There is just few requirements for further growth |
| **Total Degree of Influence** | **17** |  |

1. **ADJUSTED FUNCTION POINT COUNT SUMMARY**

|  |  |
| --- | --- |
| Adjusted Factor = 0.65 + 0.01 \* 17 | 0.82 |
| **Adjusted FPC = Unadjusted FPC \* Adjusted Factor** | **172** |