**A2.1.6\_Omninet Risk Analysis**

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Risk Analysis for Omninet Marketing Requirements Document

**Discussion**

Based on our group's reading of the Omninet Marketing Requirements Document, the Omninet System Requirements Document and our experience with testing and bugs, perform a risk analysis for Omninet.

**Answer**

We used the ISO 9126 quality risks analysis technique to perform a risk analysis for Omninet.

We start with six main quality characteristics, including functionality, reliability, usability and efficiency. We use priorities to guide the scope of testing for each risk area. Therefore, we have developed a list of Omninet quality risk analysis.

In the following table, we have technical risks, business risks, risk priority number, extent of testing and tracing.

1. Quality risk: potential system problem which could reduce satisfaction.
2. Technical Risks: likelihood of the problem
3. Business Risks: impart of the problem
4. Risk Priority Number: aggregate measure of problem risk.

To mitigate these risks, the risk analysis should be regularly updated and aligned with the project milestones. A cross-functional brainstorming team should be used to identify and assess the risks, and necessary measures should be taken to minimize their impact. The technical risks should be addressed through robust system design and testing, while the business risks can be mitigated through marketing and customer support efforts.

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Quality Risk | Tech. Risk | Bus. Risk | Risk. Pri.# | Extent of Tesing | Tracing |
| Functionality |  |  |  |  |  |
| Web is unavailable | 4 | 1 | 4 | Extensive | 3.1 |
| Some languages are not available | 3 | 3 | 9 | Broad | 3.1.5 |
| Can not handle the case where blocks of time are modified deliberately | 2 | 1 | 2 | Extensive | 3.1.2 |
| Can not pop up a message properly | 5 | 1 | 5 | Extensive | 3.1.2 |
| Improper information is not blocked by the system | 3 | 2 | 6 | Broad | 3.1.6 |
| The system can not detect or prevent the receiving and sending of virus, worm or malicious codes | 1 | 1 | 1 | Extensive | 3.1.6 |
| Users can not log out mannually | 2 | 3 | 6 | Broad | 3.1.7 |
| Sessions are not closed automatically after expiration | 3 | 3 | 9 | Broad | 3.1.7 |
| Cookies, downloaded files and other historical data are not cleared | 2 | 2 | 4 | Extensive | 3.1.8 |
| Can not restart the browser at the Welcome screen when a session terminates. | 3 | 2 | 6 | Broad | 3.1.8 |
| Sever is not available when updating | 2 | 1 | 2 | Extensive | 3.2.1 |
| Users' information may be gotten illegally | 1 | 1 | 1 | Extensive | 3.2.3 |
| Call center agents are not able to add blocks of time | 4 | 3 | 12 | Cursory | 3.2.4 |
| Users can not receive a refund for unused time when termination occurs. | 5 | 1 | 5 | Extensive | 3.2.5 |
| Users can not receive the message of termination. | 5 | 4 | 20 | Oppotunity | 3.2.5 |
| Localization |  |  |  |  |  |
| Terminals are not displayed in the local language | 2 | 2 | 4 | Extensive | 3.1.5 |
| Websites are not displayed in the local language | 2 | 2 | 4 | Extensive | 3.1.5 |
| Kiosks do not accept payments made with local currencies | 2 | 2 | 4 | Extensive | 3.1.5 |
| The system can not display time in the local time zone | 3 | 3 | 9 | Broad | 3.1.5 |
| Reliability |  |  |  |  |  |
| The websites which the users want to open can not be compatible with the existing browsers | 3 | 3 | 9 | Broad | 3.1 |
| The connection speed of PSTN is sometimes lower than 50 KBPS | 2 | 3 | 6 | Broad | 3.1.4 |
| The connection speed of DSL or cable is sometimes lower than 128 KBPS | 2 | 3 | 6 | Broad | 3.1.4 |
| The kiosks fail to have access to the latest drivers, patches or other updates from the server farm | 4 | 1 | 4 | Extensive | 3.1.6 |
| The kiosks fail to obtain the latest virus, worm, malicious codes or blocked Website information, which are provided by the server farm | 4 | 1 | 4 | Extensive | 3.1.6 |
| The kiosk sessions may crash during the update processes | 3 | 2 | 6 | Broad | 3.2.1 |
| The server farm connects too many kiosks which may cause crashes | 1 | 4 | 4 | Extensive | 3.2.1 |
| The kiosk does not report status to the call center. | 4 | 3 | 12 | Cursory | 3.2.2 |
| Usability |  |  |  |  |  |
| The scheme and components of webpage can not be easily understood by users, such as incomprehension of language, complex operations, unclear navigations etc. | 2 | 2 | 4 | Exensive | 3.1 |
| Can not display an inviting welcome message | 5 | 5 | 25 | Report Bugs | 3.1.1 |
| Users need more than 1 hour | 4 | 3 | 12 | Cursory | 3.1.2 |
| Users fail to set preferred languages easily | 3 | 2 | 6 | Broad | 3.1.5 |
| Call center agents can not get access to the current sessions | 3 | 2 | 6 | Broad | 3.2.1 |
| Call center agents can not get access to the previous sessions | 3 | 2 | 6 | Broad | 3.2.2 |
| Call center agents can not modify user sessions | 3 | 2 | 6 | Broad | 3.2.4 |
| Call center agents can not terminate user sessions | 2 | 1 | 2 | Extensive | 3.2.5 |
| Efficiency |  |  |  |  |  |
| The server responds too slowly, and users can not perform trading normally | 2 | 2 | 4 | Extensive | 3.1 |
| The relevant information can not be shown within the specified time | 4 | 3 | 12 | Cursory | 3.1.1 |
| The PSTN connection can not be established or the speed is lower than 50 KBPS | 4 | 2 | 8 | Broad | 3.1.4 |
| Sessions can not be updated on time | 2 | 1 | 2 | Extensive | 3.1.7 |
| The server delivers updates too slowly, and the updates can not be completed before usage peak | 5 | 1 | 5 | Extensive | 3.2.1 |
| Maintainability |  |  |  |  |  |
| Kiosks can not connect to the server farm and ask for updates | 3 | 3 | 9 | Broad | 3.2.1 |
| Call center agents can not push updates to Kiosks | 3 | 2 | 6 | Broad | 3.2.1 |
| The update application on the application server is overloaded all the time, the system will retry continuously. | 4 | 1 | 4 | Broad | 3.2.1 |
| Portability |  |  |  |  |  |
| Kiosks can not support the real environment of deployment | 3 | 2 | 6 | Broad | 3 |
| Omninet kiosk is only available on windows | 2 | 5 | 10 | Broad | 3.1.3 |