TASMU Experience Policy

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Policy Abstract

This is the TASMU Experience Policy, and covers rules governing accessibility, user interface design, consumer impact and the end user experience. It also covers the requirements for reliability, availability and rules for managing user generated content on TASMU Smart Services.

Copyright Notice

Requirements Language

The key words "SHALL", "SHALL NOT", "SHOULD", "SHOULD NOT", "RECOMMENDED", "NOT RECOMMENDED", "MAY", and "OPTIONAL" in this document are to be interpreted as follows:

- **SHALL**: This word, means that the definition is an absolute requirement of the policy.
- **SHALL NOT**: This phrase, means that the definition is an absolute prohibition of the policy.
- **SHOULD**: This word, or the adjective "RECOMMENDED", mean that there may exist valid reasons in particular circumstances to ignore a particular item, but the full implications must be understood and carefully weighed before choosing a different course.
- **SHOULD NOT**: This phrase, or the phrase "NOT RECOMMENDED" mean that there may exist valid reasons in particular circumstances when the particular behaviour is acceptable or even useful, but the full implications should be understood and the case carefully weighed before implementing any behaviour described with this label.
- **MAY**: This word, or the adjective "OPTIONAL", mean that an item is truly optional.

Normative References

[Code on Advertising, Marketing and Branding]

Communications Regulatory Authority, Code on Advertising, Marketing and Branding, September 2014

[Cyber Crime Law]

Law No. (14) of 2014: On Combating Cyber Crime Law

[Consumer Protection Law]

Law No. (8) of (2008) regarding Consumer Protection (the "Consumer Protection Law"), 2018, Ministry of Commerce and Industry (MOCI)

[GMSF]

Government Mobile Services Framework - Part 2, October 2017

[Government_Mobile_Services_Framework]

Government Mobile Services Framework - Part 1, October 2017

[Qatar's eAccessibility Policy]

Qatar's eAccessibility Policy, November 2011

[Qatar's E-commerce Guidelines]

MOTC, Qatar's E-commerce Guidelines, April 2018

[TASMU Security Policy]

TASMU Security Policy, 2020, TASMU

Informative References

[Consumer Protection Policy]

CRA, Consumer Protection Policy, January 2014

[Government Website & e-Services Framework]

MOTC, GWSF, Version 2.0, April 2016

[Mada E-Accessibility Guide]

Mada E-Accessibility Guide, Date

[Mada Web Accessibility Portal]

Code Repository Widget, UX repository and other Mada resources, Date

[Mobile Web Best Practices]

W3C, Mobile Web Best Practices, Version 1.0, 29 July 2008

[PIPP]

Qatar's Personal Information and Privacy Protection (PIPP) Law, Law No 13 of 2016 on protecting personal data

[Spam Regulation]

CRA, Spam Regulation, August 2017

[WC3]

World Wide Web Consortium

[WCAG]

W3C, Web Content Accessibility Guidelines (WCAG) 2.1, Version 2.1, June 2018

Contents

Definitions

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TASMU

The definitions used in this policy have been written to provide contextual clarity and where necessary specificity, and should not be interpreted to be contradictory to any laws in the State of Qatar.

[Abnormal Condition]

An unforeseen situation that could cause a sudden increase in demand, which could potentially impact reliable performance.

[Assistive Technology]

Is any information and communications technology, products, devices, equipment and related services used to maintain, increase, or improve the functional capabilities of individuals with special needs or disabilities.

[Availability Management]

Information related to matching the availability of the TASMU Smart Service against the current and future identified needs of the business or to exceed them.

[Bounce Rate]

The percentage of users who visit a single page on your website and then leave before taking any action.

[Consent]

Consent is an affirmative, freely given and informed agreement of a Subscriber for the Processing of their data. Natural persons ("individuals") must be able to control the Processing of their Personal Data within the TASMU Ecosystem and where necessary provide explicit Consent, which signifies their agreement, expressly confirmed in words, to specific Processing.

[Conversion Rates]

The percentage of people that visited the website and either signed up or made a purchase is the conversion rate.

[Cyber Resilience]

This refers to the ability to continuously deliver the intended outcome, protecting data assets despite adverse cyber events.

[Electronic Communication]

Any communication initiated by the TASMU Service Operator made by means of telecommunications such as email, text message, voicemail or video.

[ICT Accessiblity]

is a measure of the extent to which a product or service can be used by a person with a disability as effectively as it can be used by a person without that disability for purposes of accessing or using ICT related products or services.

[Internet of Things]

The Internet of Things (IoT) is a system of interrelated computing devices, mechanical and digital machines, uniquely identified with the ability to transfer data over a network to Sector Platforms and/or the Central Platform.

[IOT Endpoint]

An IoT Endpoint is a physical computing device that performs a function or task as part of a TASMU Smart Service.

[MADA]

Mada, Assistive Technology Center is a non-profit organization that aims at promoting digital inclusion and building a technology-based community that meets the needs of persons with disabilities and the elderly in Qatar.

[Normal Condition]

The system performance in a 'Business As Usual' scenario.

[Net Promoter Score]

is an index that measures the willingness of Subscribers to recommend a service to others. It is used as a proxy for gauging the Subscriber's overall satisfaction with a TASMU Smart Service and their loyalty to the brand.

[Pages Per Visit]

The average number of pages that users navigate on the site in a single visit.

[Personal Data]

Data of a natural person ('individual') which is specifically identifiable or can be reasonably identified either by the Personal Data itself or through a combination of other data. An identifiable natural person is one who can be identified, directly or indirectly, in particular by reference to an identifier such as a name, an identification number, location data, an online identifier or to one or more factors specific to the physical, physiological, genetic, mental, economic, cultural or social identity of that natural person.

[Processing]

Any operation or set of operations which is performed on Personal Data, such as collecting; recording; organizing; storing; adapting or altering; retrieving; consulting; using; disclosing by transmission, dissemination or otherwise making the data available; aligning or combining data, or blocking, erasing or destroying data. Not limited to automatic means.

[Reliability]

The probability that the system will correctly deliver TASMU Smart Service as expected by the Subscriber.

[Returning Visitors]

This measures the percentage of users who return to the site after their first visit.

[Service Availability]

Ability of a TASMU Smart Service to perform its agreed function when required. Availability is determined by Reliability, Maintainability, Serviceability, Performance, and Security. Availability is usually calculated as a percentage. This calculation is often based on Agreed Service Time and Downtime.

[Spam]

Unsolicited Electronic Communication.

[Subscriber]

An organisation or individual who utilises a TASMU Smart Service. They subscribe to and are authenticated by the TASMU Ecosystem. In some contexts they may be referred to as consumers.

[TASMU Brand]

The tone and style used throughout the TASMU Smart Service as defined in the TASMU Brand Guidelines. The TASMU Brand is the holistic sum of Subscribers' experiences, composed of visual, tonal and behavioural brand components, many of which are shaped by interaction design.

[TASMU Ecosystem]

This is the Smart Qatar (TASMU) platform and any TASMU Smart Service that is either connected to this Central Platform or is branded as TASMU compliant. Refer to (A) in the TASMU Conceptual Diagram.

[TASMU Smart Nation Regulator]

The entity in the State of Qatar who regulates the TASMU Ecosystem. It is responsible for drafting, promoting, governing, updating, monitoring compliance with, and enforcing this policy.

[TASMU Smart Service]

A TASMU Smart Service is a national service, leveraging one or multiple technologies, to resolve an identified challenge and that operates in the TASMU Ecosystem. Collectively, TASMU Smart Services focus on detailing and contextualizing services relevant for the State of Qatar.

[TASMU Service Operator]

This is the owner and operator of the TASMU System, who has overall responsibility for its secure, compliant operation.

[TASMU System]

This refers to any of the following elements from the TASMU Conceptual Diagram:

- (C) Any smart application or service
- (D) Any networking between platforms and (C)
- (E) Sector data analytics platforms
- (F) Central data analytics platform
- (G) Any networking between platforms and devices (H)
- (H) Any smart devices
- (I) The TASMU Control Centre
- (K) Security Management System of the TASMU Ecosystem
- (L) Operations Management System of the TASMU Ecosystem

[Time On Site]

The length of time a Subscriber spends on the website or mobile app (aka. Session Duration).

[Terms of Service]

This sets out the contractual terms for a TASMU Smart Service and acts as the legal agreement between the TASMU Service Operator and a Subscriber. They incorporate items such as terms of use, costs/charges, licenses, termination, security and privacy provisions, etc.

[Tracking Cookie]

A type of cookie (a small data file saved by a website onto the Subscriber's computer or device) that shares details of their browsing activities between two or more unrelated sites or services.

[Universal design]

Universal design is design criteria aimed at ensuring that everyone can participate in the information society.

[Usability Principles]

A set of principles (Heuristics) that examine the interface and evaluate its compliance with recognized usability requirements; these are Findability, Intuitiveness, Efficiency, Clarity, Learnability, Forgiveness, Accessibility, and Relevance & Value.

[Virtual Components]

These are components such as virtual machines, containers, virtual network appliances/functions, serverless functions and virtual management systems.

1. Introduction

1.1 TASMU

The Qatar National Vision 2030 aims to "transform Qatar into an advanced society capable of achieving sustainable development." TASMU, or the Smart Qatar program, is a digital response to the goals that have been set out in the National Vision 2030. It is about harnessing technology and innovation to improve quality of life and help drive economic diversification.

Smart Qatar aims to leverage innovative applications of technologies to provide targeted services for residents, businesses and government across priority sectors. The foundation of this whole-of-nation effort relies on the ability to collect and manage vast amounts of data, share and open it up for spawning broad-based innovation and entrepreneurship within a set of defined rules and regulations. This is then processed and analysed by different actors for the build-up of innovative services and applications. As such, governance of TASMU on a national level has been designed to harmonize efforts across the different actors and drive Smart Qatar development with a key focus on ensuring efficiency and building resilience and interoperability.

TASMU Smart Services are services designed to solve evolving challenges targeted constituents (people, businesses, or government) face, leveraging technology and innovation. TASMU Smart Services cut across industry sectors focusing on human, social, economic, and environmental development. They can be focused on providing convenience or entertainment, or could address critical needs such as national safety and security. As such, the type of information they leverage can range from publicly open to sensitive or private information.

The policy covers the TASMU Ecosystem and interactions with it. The diagram below shows the TASMU Ecosystem in context to this policy.

TASMU ECOSYSTEM CONCEPTUAL MODEL
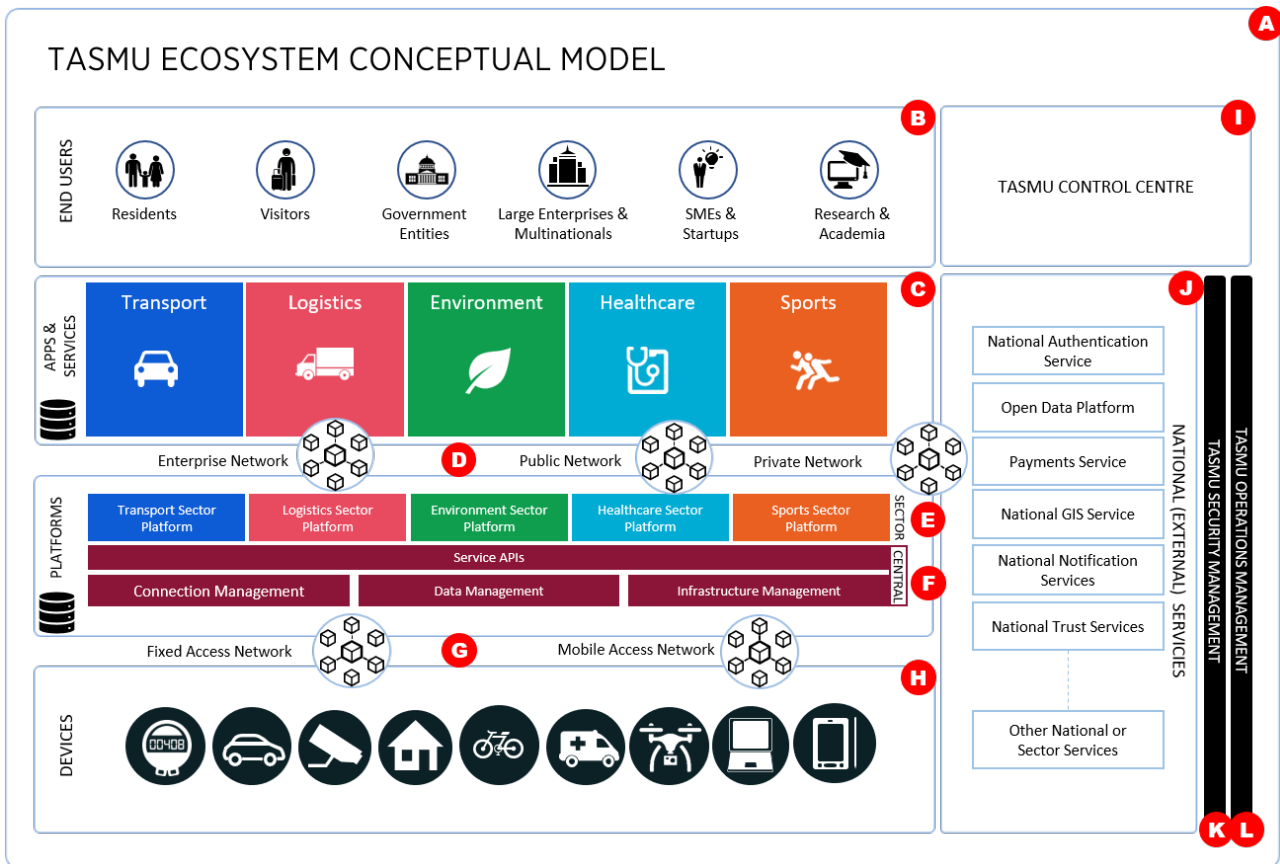
Only the following elements are within the scope of this policy:

- A: is the overall ecosystem
- B: is the end-user ecosystem
- C: is the TASMU Smart Services and services ecosystem
- D: are the network connections from the central platform, over enterprise, public and private networks
- E: are the sector data analytics platforms ('Sector Platforms')
- F: is the central TASMU data analytics platform ('Central Platform')
- G: is the Internet of Things (IoT) access network, either over fixed or wireless networks
- H: is the IoT devices ecosystem
- J: is the ecosystem of national services/platform that connects to the TASMU Central Platform and (C) above
- K: is the TASMU security management ecosystem

1.2 TASMU Experience Policy

It is vitally important that TASMU provides meaningful, safe and relevant experiences to a Subscriber of TASMU Smart Services. This involves the design of the entire process of acquiring and integrating the product, including aspects of branding, accessibility, usability and function of the TASMU Smart Service.

The objective of this policy is to ensure that the needs of all types of Subscribers are met and that a consistent experience is provided to them across the TASMU Ecosystem.

This policy specifies the rules that the TASMU Service Operator needs to adopt to ensure a quality Subscriber experience. This policy specifies controls for accessibility of channels and user devices for the Subscriber, in addition to user interface design and consumer protection including user generated content management. Finally it covers the requirements for service availability and reliability.

This TASMU Experience policy is governed by the TASMU Smart Nation Regulator.

1.3 Scope & Application

1. All TASMU Service Operators SHALL apply this policy to ensure their TASMU Smart Service does not discriminate against people with any disabilities.

2. For the Reliability & Availability Controls, the TASMU Service Operators SHALL undertake the Criticality Assessment, to determine which controls are applicable for their service.

1.4 Compliance

All TASMU Service Operators SHALL:

1. Comply with this policy where they operate a TASMU System or provide a TASMU Smart Service to a Subscriber, prior to operating in the TASMU Ecosystem and on a regular basis as directed by the TASMU Smart Nation Regulator.

2. Ensure that this policy is applied to all aspects of the TASMU System, whether that is maintained or operated by a third party, prior to operating in the TASMU Ecosystem.

3. Ensure this policy is considered in conjunction with the specific TASMU Smart Service sector policy issued by the TASMU Smart Nation Regulator or the sector regulator, which will cover specific requirements of the TASMU Smart Service.

4. Allow for an independent audit to check compliance, as and when necessary, or as directed by the TASMU Smart Nation Regulator.

2. User Experience and User Interactions

2.1 User Experience

1. The TASMU Service Operator SHOULD use the User Experience Guidelines from the Qatar's E-commerce Guidelines to design and continuously improve their respective Subscriber interactions with TASMU Smart Services. The User Experience Guidelines provide user-centred design methodologies and toolkits that SHOULD be adopted to ensure an optimised experience for the Subscriber.

2. The TASMU Service Operator SHOULD:

   a. adopt guidelines provided in Guideline 2.2 of the Government Mobile Services Framework document in order to design the TASMU Smart Services for optimal user experience.
   b. refer to the Mobile Web Best Practices developed by the W3C which includes comprehensive guidelines for developing websites that work well on mobile devices.

3. The TASMU Service Operator SHOULD identify where and how Subscribers can easily download and use any applications related to the TASMU Smart Service, through a recognised and trusted software store.

4. The TASMU Smart Service SHALL be supported by the device it runs on and the content to be presented in a format supported by the device without requiring additional plug-ins or software to be downloaded.

5. The TASMU Smart Service SHOULD NOT rely on technology that is not universally supported by Subscribers' devices.

6. The TASMU Service Operator SHOULD ensure software application are of a reasonable size to ensure short downloads and installation times.

2.2 Digital Accessibility

1. The TASMU Service Operator SHALL:

    a. use Qatar's eAccessibility Policy and ensure that the TASMU Smart Service meets international best practice as specified in the Web Content Accessibility Guidelines 2.1
    b. ensure that Assistive Technology such as accessible handsets are available in the market for purchase or for rent as needed where a TASMU Smart Service is reliant on such Technology
    c. provide accessible user interfaces as part of the TASMU Smart Service to increase the usability for Subscribers who are blind or have low vision. These interfaces SHALL support the blind through mobile speech, mobile magnifiers, or any other Assistive Technology required
    d. provide information regarding the availability of Assistive Technology, accessible handsets, TASMU Smart Service related devices, user interfaces and other accessibility features and services on their websites, at customer service centres and upon enquiry

2. The TASMU Service Operator SHOULD coordinate with MADA to collaborate with persons with disabilities, service providers, manufacturers, advocates, government organizations and others at both the national and international level to increase the availability and utilization of Assistive Technology devices and services as well as accessible mainstream technology available in the State of Qatar.

2.3 Notification Management

1. The TASMU Service Operator SHALL ensure that notifications regarding impacts on the safety and security of the TASMU Smart Service or any potential impact to the health of a Subscriber caused by the Smart Service are sent without delay, and are labelled as critical notifications.

2. TASMU Service Operators MAY send Electronic Communications, however, they SHALL NOT contain:

    a. fraudulent or deceptive subject headers or content
    b. content that is prohibited or contravenes the Cyber Crime Law or any other applicable legislation of the State of Qatar
    c. Spam

3. The TASMU Service Operator SHALL provide an instant notification to confirm the transaction performed for a TASMU Smart Service through Electronic Communications. The message SHALL include a reference number and receipt that is in printable format.

4. In case of a back office approval that is required for the TASMU Smart Service, the Electronic Communication SHALL include:

    a. a reference number
    b. a contact telephone number
    c. date and time of the request

2.4 Arabic Integration

1. The TASMU Service Operator SHALL:

    a. provide the TASMU Smart Service in at least Arabic and English languages. This includes delivery of services over websites as well as mobile applications
    b. ensure that the Arabic and English versions are similar in terms of content and other language-specific layout standards
    c. ensure that the Arabic version is right aligned and the English version is left aligned
    d. ensure that it is easy to switch between different languages (English, Arabic and other languages)

2.5 Analytics Metrics

1. The TASMU Service Operator SHALL track and report User Experience (UX) analytics metrics to [TASMU Conceptual Diagram (E), (F)] in order to track Subscriber interactions with the TASMU Smart Service.

2. The following metrics SHALL be captured:

   a. Returning Visitors
   b. Time On Site
   c. Pages Per Visit
   d. Bounce Rate
   e. Conversion Rates
   f. Tracking Cookie
   g. Net Promoter Score

2.6 User Interface

1. The TASMU Service Operator SHOULD use the Government Mobile Services Framework - Part 2 to refer to best practices and guidance in building bespoke User Interfaces (UI) in TASMU Smart Service.

2. The TASMU Service Operator SHALL comply with the following requirements to ensure that the information and operation of UI are understandable:

   a. the adopted TASMU visual identity is consistently used across all elements of the design of the TASMU Smart Service interface
   b. design page layouts are consistent, well-structured and provide a sense of hierarchy
   c. the home page includes all relevant features and functionality and important elements
   d. supports the ability to changing screen orientation
   e. buttons and icons adhere to Usability Principles, and are consistent and labelled correctly
   f. typography is readable, legible and consistent
   g. colour has been used to provide both aesthetic value and meaning
   h. animation uses a scientific approach to convey meaning and enhance the interface

3. The TASMU Service Operators SHALL ensure mobile native applications include clear text or imagery pertaining to the relevant Government sectors or affiliations for the TASMU Smart Services and display consistently across all screens during the service usages.

4. The TASMU Smart Services SHALL have unique and distinctive names. The TASMU Service Operator SHOULD take actions to ensure the service names are intuitive, descriptive and easy to understand by all Subscribers.

5. The TASMU Service Operators SHOULD NOT use abbreviations for the name of a TASMU Smart Service.

6. The TASMU Service Operator SHOULD use the User Interface guidelines from the Qatar's E-commerce Guidelines to build their respective interfaces for their TASMU Smart Service.

7. The TASMU Service Operator SHALL optimise websites and mobile applications associated with the TASMU Smart Service by:

   a. adapting the layout and design of websites and mobile applications for small, medium and large screen sizes, and for different input methods, such as touch input and keyboard and mouse input
   b. designing the content and interface of websites and mobile applications for small, medium and large screen sizes and for different input methods, such as touch input and keyboard and mouse input

8. The TASMU Service Operator's UI design SHALL

   a. convey the TASMU Brand identity
   b. ensure visual style guides are consistent and convey brand credibility
   c. place the TASMU logo in the header of the page

2.8 Advertisement & Consumer Protection Rules

1. A TASMU Smart Service Subscriber who has received an Electronic Communication for direct marketing purposes MAY withdraw their Consent to receive such messages in the future by replying with or sending a notice to the effect that they no longer want to receive such Electronic Communication from the sender.

2. The TASMU Service Operator SHALL provide a clear and accessible mechanism for withdrawal of Consent, which:

   a. is functional and effective; and
   b. is provided free of charge to the Subscriber withdrawing Consent; and
   c. sends a confirmation message to the Subscriber to confirm the unsubscription or opt-out.

3. The TASMU Service Operator SHALL NOT send Electronic Communications containing direct marketing:

   a. without the prior Consent of the Subscriber
   b. between the hours of 21:00/9:00 pm and 9:00/9:00 am

4. The TASMU Service Operator SHALL:

   a. ensure that advertisers comply with the legal and regulatory obligations of Qatar's Code on Advertising, Marketing and Branding, ensuring that the Subscriber is not, directly or indirectly, supplied with any false or misleading information or otherwise misled in relation to the advertiser or the TASMU Smart Service
   b. follow the consumer protection code stated in Qatar's Code on Advertising, Marketing and Branding to ensure the protection of the Subscriber, fair competition between the advertisers and the promotion of consumer confidence

2.9 Contractual Terms of Service

The TASMU Service Operator SHALL:

1. Clearly state the most recent Terms of Service, in clear Arabic and English, and provide an easily accessible online/electronic link to it.

2. Ensure that their Terms of Service are governed by the laws of the State of Qatar, who SHALL have jurisdiction over any claims.

3. Ensure any costs related to the TASMU Smart Service, are clearly available to the Subscriber.

4. Ensure clauses leading to arbitrary or unfair behaviour and, erosion of risks and liability, are not included in the Terms of Service.

5. Ensure that before a Subscriber's first use of a TASMU Smart Service, they have agreed to the Terms of Service.

6. Notify the Subscriber before any changes to either the Terms of Service or costs related to the TASMU Service Operator are implemented.

7. Ensure they proscribe the sale or promotion of services or goods that are prohibited by law in the State of Qatar.

8. Cleary stipualte any warranties and remedies for the TASMU Smart Service and adhere to Qatar's Consumer Protection Law.

9. Ensure complaints from Subscribers are investigated and resolved in a fair and timely manner.

10. Ensure that where applicable, the TASMU Smart Service is fit for purpose, meets the description, quantity and quality, and possesses the functionality, compatibility, interoperability and other features, as required by the Terms of Service or made in any public statement by the TASMU Service Operator.

11. Ensure that where applicable, updates, including security updates that are necessary for the correct operating of the TASMU Smart Service are supplied over the length of the contract.

12. Ensure that the Subscriber has the right to terminate their contract, in the event that the TASMU Service Operator has failed to supply the TASMU Smart Service or the TASMU Smart Service does not meet the conditions of clause (10).

13. Ensure any reimbursements to the Subscriber related to the TASMU Smart Service are:

    a. carried out without undue delay, within a maximum period of three (3) months
    b. provided using the same means of payment as the Subscriber used to pay for the TASMU Smart Service
    c. provided at no cost to the Subscriber

14. Ensure that they implement confidentiality and non-disclosure clauses as necessary for the protection of Personal Data.

2.10 Support for Subscribers

1. The TASMU Service Operator SHALL provide:

    a. support options for Subscribers, including a central support telephone number and email
    b. contact information and support explicitly throughout the site
    c. a mechanism to facilitate feedback specifically for matters related to Assistive Technology for any Smart Service

2.11 User Generated Content (UGC) Rules

For any TAMSU Smart Service where Subscribers are generating content, the TASMU Service Operator SHALL:

1. Be proactive and be responsible for UGC moderation.

2. Ensure UGC does not:

    a. infringe on any applicable local laws and is not fraudulent
    b. glorify violence or threaten violence against an individual or a group of people
    c. threaten or promote terrorism or violent extremism
    d. engage in the targeted harassment of someone, or incite other people to do so
    e. promote violence against, threaten, or harass other people on the basis of race, national origin, ethnicity, gender, age, disability, or serious disease
    f. promote or encourage suicide or self-harm
    g. include graphic violence and adult content
    h. promote, sell, buy, or facilitate illegal goods or services
    i. publish or threaten to publish other people's Personal Data, without their explicit Consent
    j. impersonate individuals, groups, or organizations in a manner that is intended to or does mislead, confuse, or deceive others
    k. deceptively share synthetic or manipulated media that are likely to cause harm
    l. violate others' intellectual property rights, including copyright and trademark

2.12 Subscriber Central Services

1. The TASMU Service Operator SHALL ensure:

    a. their TASMU Systems use the Notification Services as part of J: National Services to ensure a positive and trustworthy user experience for Subscribers
    b. notifications to Subscribers are channelled through this service unless the notification contains Personal Data that is determined to require a special channel

2. The TASMU Service Operator SHOULD ensure that their TASMU Systems use the Payment Services as part of J: National Services to ensure a positive and trustworthy user experience for Subscribers. These are payment settlement solutions supporting transactional activities resulting from TAMSU Smart Services, such as billing and payment collection, processing and settlement.

3. The [TASMU Service Operator](#) [SHOULD](#) ensure that their [TASMU Systems](#) use the National Geospatial Services as part of [J: National Services](#) to ensure a positive and trustworthy user experience for [Subscribers](#). These services are national geospatial information providing maps (including addresses and landmarks) and satellite images for consumption by the [TAMSU Smart Service](#).

3. Reliability & Availability Controls

3.1 Criticality Assessment

To determine criticality of the [TAMSU Smart Service](#) and hence the relevant controls, the following factors need to be evaluated:

- **Service Frequency**: This is a proxy for understanding how critical the [TAMSU Smart Service](#) is. It is measured by the peak frequency of service usage on a daily basis.
- **Economy**: Annual revenue generated/forecasted by the [TASMU Smart Service](#) (QAR Millions).
- **Substitute Service**: Refers to the availability of an alternative service that a [Subscriber](#) perceives as similar or comparable to a [TASMU Smart Service](#), in case of its failure. This is measured by the number of available alternatives.
- **Reputation**: The degree to which the reputation of the [TASMU Ecosystem](#) may be impacted by reliability issues with the [TAMSU Smart Service](#). This is measured as international impact (I), national impact (N), or private impact (P), which refers to localised impact only to the service's [Subscribers](#).

Impact Factor (weight)	High/5	Medium/3	Low/1
Service (35)	>80%	20%-80%	<20%
Economy (25)	>100	10-100	<10
Substitute (25)	0	1	>1
Reputation (15)	I	N	P

3.2 Criticality Calculation

Using the [Criticality Worksheet](#), determine the rating for the [TAMSU Smart Service](#) and apply the following:

- For any [TAMSU Smart Service](#) with a criticality value < 200, all baseline [B] controls [SHALL](#) apply
- For any [TAMSU Smart Service](#) with a criticality value > or = 200, all baseline [B] and enhanced [E] controls [SHALL](#) apply

For the avoidance of doubt, the baseline and enhanced controls set out in §[Reliability & Availability Rules](#) apply in addition to all the requirements listed in §[User Experience and User Interactions](#), above.

3.3 Reliability & Availability Rules

The [Reliability](#) & [Service Availability](#) of a [TASMU Smart Services](#) has a huge impact on [Subscribers'](#) experience and TASMU's brand reputation, especially where the service is critical and had impact on the national economy and/or international reputation.

In order to ensure the [Reliability](#) & [Service Availability](#) of [TASMU Smart Services](#), the [TASMU Service Operator](#) [SHALL](#) adopt the following best practices to design, implement and operate [TASMU Systems](#):

1. [B] Define service [Reliability](#) & [Service Availability](#) KPIs and SLAs in line with the [TASMU Smart Services](#) criticality.

2. [B] Select the necessary systems that compose the [TASMU System](#), and ensure they adhere to the defined [Reliability](#) & [Service Availability](#) KPIs and SLAs.

3. [B] Design, implement and operate systems that compose the [TASMU System](#) in a coordinated manner to perform reliably under [Normal Conditions](#).

4. [B] Control and manage any upgrades and changes on TASMU Systems to minimise the impact on their Reliability & Service Availability.

5. [B] Provide and maintain facilities for monitoring the TASMU System's Reliability & Service Availability.

6. [B] Check capabilities and provide training to personnel responsible for the operation of TASMU Systems, on Reliability & Service Availability

7. [B] Conduct regular review of Subscribers, and define processes for the continuous improvement of the TASMU Smart Services.

8. [B] Comply with the TASMU Security Policy and protect the software and hardware of TASMU Systems from malicious physical or cyber attacks.

9. [E] For critical TASMU Smart Services, develop, implement and maintain plans for emergency operation and disaster recovery of TASMU Systems.

10. [E] Scenario test Abnormal Conditions and conduct impact analysis, defining solution(s), strategy and processes to minimise the impacts on Subscribers' experience under the Abnormal Condition.