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Digital analytics and web analyses for purposes of market, opinion and social research — Vocabulary and service requirements

Analytique numérique et analyses web pour les besoins d'études de marché, études sociales et d'opinion — Vocabulaire et exigences de service

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Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular the different approval criteria needed for the different types of ISO documents should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2 (see www.iso.org/directives).

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights. Details of any patent rights identified during the development of the document will be in the Introduction and/or on the ISO list of patent declarations received (see www.iso.org/patents).

Any trade name used in this document is information given for the convenience of users and does not constitute an endorsement.

For an explanation on the voluntary nature of standards, the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the World Trade Organization (WTO) principles in the Technical Barriers to Trade (TBT) see the following URL: www.iso.org/iso/foreword.html

This document was prepared by ISO/TC 225, *Market opinion and social research*.

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Introduction

Analyses of digital behaviour and online digital statements by persons and companies have rapidly increased in importance. Examples are the measurement of the behaviour of website visitors, the measurement of behaviour by means of cookies, and the registration and measurement of statements and sentiments of users of social media.

This document provides insight into the working methods of service providers in the fields of digital analytics and web analyses research and, in this way, provides clients with transparency regarding the services they offer. This document is intended to supplement and be used in conjunction with ISO 20252.

Digital analytics and web analyses for the purpose of market, opinion and social research can be separated from the equivalent analyses carried out for non-research purposes. In both cases, the protection of privacy of the persons analysed is regulated by legal provisions that apply to the particular project and, furthermore, by the relevant professional codes of conduct and other ethical guidelines.

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Digital analytics and web analyses for purposes of market, opinion and social research — Vocabulary and service requirements

1 Scope

This document specifies the terms and definitions, as well as the service requirements, for organizations and professionals that conduct digital analytics and web analyses for collecting, analysing and reporting of digital data for purposes of market, opinion and social research by various methods and techniques. It provides the criteria against which the quality of such services can be assessed and evaluated.

This document applies to digital analytics and web analyses conducted by service providers on their own initiative, commissioned by clients or conducted by clients themselves.

This document applies to digital and web analysis research activities such as:

— understanding the usage of websites via the use of cookies, page impressions and other means, navigation across sites, time spent by visitors and their actions;

— online metered panels, e.g. on-going measurement of web visitation via meters installed on panellists' desktop, mobile or tablet devices;

— tag-based solutions to measure online usage at universe level, which can be integrated with metered panel data to provide a hybrid measurement;

— social media analytics which collect, aggregate and analyse online comments, and user-generated content such as blogs, forums and comments on news sites or other sites.

NOTE Universe can also be known as population.

This document can be construed to cover all forms of digital data collection including from desktop computers, tablets, mobile devices and over the top (OTT) devices as well as internet of things (IoT) devices where applicable.

2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 20252, *Market, opinion and social research — Vocabulary and service requirement*

3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO 20252 and the following apply.

ISO and IEC maintain terminological databases for use in standardization at the following addresses:

— ISO Online browsing platform: available at http://www.iso.org/obp

— IEC Electropedia: available at http://www.electropedia.org/

3.1
ad impression
display of an advertisement on a device

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3.2
algorithm
process or set of rules to be followed in calculations or other problem solving operations

3.3
anonymization
process of removing, obscuring, aggregating, or altering identifiers with the aim of preventing the identification of individuals to whom data originally related

3.4
application programming interface
API
set of definitions on the basis of which a computer programme can communicate with another programme or component, and which can also support access/data exchange internally or externally

3.5
audit
systematic, independent and documented process for obtaining evidence and evaluating it objectively to determine the extent to which *audit criteria* (3.6) are fulfilled

[SOURCE: ISO 20252:2012, 2.5]

3.6
audit criteria
set of policies, procedures or requirements used as a reference

[SOURCE: ISO 20252:2012, 2.6]

3.7
bot
autonomous software that operates as an agent for a user or a program or simulates a human activity

3.8
client
individual, organization, department or division, internal or external, that requests or commissions a research project

[SOURCE: ISO 20252:2012, 2.10]

3.9
code
numeric or alpha character or combination of characters associated with each response category

[SOURCE: ISO 20252:2012, 2.11]

3.10
code frame
list of categories with associated *codes* (3.9) for classifying observations or statements

[SOURCE: ISO 20252:2012, 2.12, modified]

3.11
consent
freely given agreement based on adequate information obtained prior to the collection of *participant* (3.27) data

Note 1 to entry: When conducting research with children, additional consent requirements apply, e.g. permission from a responsible adult.

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3.12
cookie
small piece of information (i.e. programme code) that is stored on a browser for the purpose of identifying that browser during audience activity and between visits or sessions

3.13
dashboard
software application with which a number of mini-applications can be reviewed or managed and reported

EXAMPLE Offer data exports, allow API access.

3.14
data collection
process for gathering information by different means

Note 1 to entry: This includes activities such as web monitoring.

3.15
device ID
distinctive number or *code* (3.9) associated with a specific digital device which can be personally identifiable

Note 1 to entry: Such devices can have multiple device IDs, each used for different purposes, for example to enable services such as WiFi or Bluetooth, or to uniquely identify specific devices operating on a mobile carrier network.

3.16
digital analytics
analysing and reporting of electronic data for the purpose of measuring and understanding humans and their behaviour

3.17
digital fingerprint
technology that deploys *algorithms* (3.2) that analyse a large number of technical characteristics and settings on devices to generate unique identifiers that can identify a specific computing device producing a machine ID, and which can be personally identifiable

Note 1 to entry: This ID can change over time depending on actions taken on the device.

Note 2 to entry: Also known as device, machine, or browser fingerprint.

3.18
dongle
small piece of hardware, often a USB device, that can be connected to other electronic equipment, to enable additional services such as access to the internet

3.19
incentive
gift, payment, or other considerations offered to potential *participants* (3.27) to increase cooperation

[SOURCE: ISO 20252:2012, 2.31]

3.20
internal audit
periodic checks carried out by a company's own trained employees as to whether projects within the company have been carried out in accordance with the described procedures

3.21
internet of things
IoT
infrastructure of interconnected objects, people, systems, and information resources together with intelligent services to allow them to process information of the physical and the virtual world and react

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3.22
machine learning
technology of getting computers to act without being explicitly programmed

EXAMPLE Speech recognition, effective web search.

3.23
malware
variety of forms of hostile or intrusive software, including computer viruses, worms, Trojan horses, ransomware, spyware, adware, scareware and other malicious programs

3.24
mobile device
portable electronic device which can collect data that can be uploaded to a third party either immediately or upon syncing with appropriate software

Note 1 to entry: Mobile devices might include smartphones, smart watches, fitness or health tracking devices, tablets, and geo-location devices.

3.25
nearfield communication
NFC
short-range wireless technology that enables communication between devices over a short distance

3.26
over the top
OTT
digital services delivered over the internet rather than via a service provider's own dedicated, managed internet protocol television (IPTV) network

Note 1 to entry: Examples of digital services include Amazon Fire, Apple TV, Chromecast, Roku, Netflix or Slingbox[1)].

3.27
participant
person from whom or about whom data are collected

3.28
quality manager
person who is responsible for the formulation of quality requirements within an organization and for the procedures and measurements aimed at the implementation of quality controls

3.29
robot instruction file
file that defines how a search engine should interact with the pages and files of a web site and is often used to define where automated systems are not allowed to go

3.30
sample
subset of the *target population* (3.36) from which data are to be collected

[SOURCE: ISO 20252:2012, 2.58]

3.31
sentiment
mood associated with, for example, a sound, image, or statement, usually on a continuum from positive to neutral to negative

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3.32
service provider
organization that conducts research projects or parts of research projects in market, opinion and social research

[SOURCE: ISO 20252:2012, 2.55, modified]

3.33
social media
online technologies and practices that people use to share opinions, insights, experiences and perspectives with each other, transforming traditional one-to-many interactions into many-to-many interactions

[SOURCE: ISO 20252:2012, 2.63]

3.34
spyware
devices or software that capture a *participant*'s (3.27) behaviour without obtaining *consent* (3.11)

3.35
subcontracting
outsourcing
passing responsibility for executing an element of the project to a third-party service provider

[SOURCE: ISO 20252:2012, 2.64, modified]

3.36
target population
population of interest in the research project to which inferences are to be made

[SOURCE: ISO 20252:2012, 2.66]

3.37
text analysis
method used to describe the characteristics of a message

Note 1 to entry: This may also be referred to as content analysis.

3.38
unique visitor
unique user
inferred measure that signifies a distinct, unduplicated, individual requesting page from the website during a given period, regardless of how often they visit

3.39
validation
process of using objective evidence to confirm that the requirements which define an intended use, application or outcome have been met

Note 1 to entry: Validation can be carried out under realistic use conditions or within a simulated use environment.

3.40
web analysis
analysing and reporting of behaviour, statements and *sentiments* (3.31) from users/*participants* (3.27) of online platforms

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3.41
web beacon
pixel tracker
web bug
piece of *code* (3.9), often a 1 × 1 pixel, on a website used to track website activity

Note 1 to entry: This differs from beacon, which is a low-powered transmitter which notifies nearby devices of its presence, and can be used to trigger an action.

3.42
weighting
calculation process in which different units or subgroups are recalculated by assigning numerical values, as necessary, to correct and/or improve the representativeness of *sample* (3.30) estimates

[SOURCE: ISO 20252:2012, 2.69]

4 Research project management requirements

4.1 Organization and responsibilities

4.1.1 Management of the research process

Service providers in the field of digital analytics and web analyses shall use for research projects a research process which covers all the requirements of this document.

The research process shall be documented. It can differ from one organization to another due to the following:

— the size of the organization and type of research activities;

— complexity of and risks associated with research projects and their interactions;

— the competence of personnel.

Procedures, instructions and methods required for completing the different tasks in accordance with the requirements of this document shall be documented, implemented, monitored, maintained and auditable.

Documents may address the requirements for one or more procedures. A requirement for a documented procedure may be covered by more than one document. The documentation can be in any form or type of media.

4.1.2 Project management responsibilities

The service provider, as part of its project management, shall take responsibility for:

— committing to quality of client service (including a statement of quality policy) appropriate to the purpose of research projects;

— documenting the organizational structure of the service provider, including the responsibilities of the people involved in the delivery of research services;

— reviewing and improving the research project;

— ensuring the provision of adequate and appropriate resources and information for the process, including the appointment of a research quality manager;

— ensuring that everyone involved in the provision of the research service is familiar with the applicable national and international ethical and professional codes, requirements of relevant legislation and documented procedures and methods which specifically affect their work.

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