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# Subscription Video on Demand (SVOD) platform accessibility verification method

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**Abstract**— How can you measure the percentage of sensory accessibility in the new Subscription Video on Demand (SVOD) platforms? This investigation aims to answer this research question. For this, a qualitative methodology model based on a content analysis of 37 variables is presented, which have been written based on the Spanish technical regulations *UNE 153010 de mayo 2012 del Subtitulado para personas sordas y personas con discapacidad auditiva* and *UNE 153020 de enero 2005 de la Audiodescripción para personas con discapacidad visual*. This method is applicable for cinema, series and short films presented at SVOD and is limited to the accessibility of subtitling for deaf people (CC) and the audio description for blind people.

## I. INTRODUCTION

PEOPLE with sensory disabilities show great interest in the new SVOD (Subscription Video on Demand) platforms [1], such as Netflix, HBO, Movistar Plus or Amazon Prime Video, among others [1]. From a commercial point of view, the audience with sensory disabilities can be understood as a niche market and companies that offer adapted products and services obtain a competitive advantage as a result [2]. On the other hand, the normalization of audiovisual accessibility is an indispensable requirement for the construction of inclusive societies that guarantee social welfare.

The objective of this work is to present a useful, efficient and reliable methodology for measuring the percentage of accessibility in subtitling and audio description of audiovisual products on SVOD platforms.

## II. STATE OF THE ART

The legal system, and also common sense, recognize the right of participation of people with disabilities in social life. Gone is the time when a person with a disability was considered 'less valid' and their social marginalization was 'justified' for it.

The concern of public institutions for the accessibility and non-discriminatory representation of people with disabilities in the media is a fact that is reflected in the number of style guides and manuals published in this regard, such as those promoted by the Spanish Center of Documentation on Disability (CEDD) of the Royal Board on Disability [3].

Likewise, there is greater awareness on the part of television producers about accessibility services, since the data offered by the Spanish Center for Subtitling and Audio

Description (CESyA) show an evolution of these services. According to its latest report, it has gone from 50% to 75% of subtitled programming. Since the current General Audiovisual Law was imposed, the number of annual audio-described hours has increased from 154 to 8,738, and from 88 to 3,657 hours in the case of programming with sign language [4]

Several authors have already analyzed the parameters of accessibility to media such as Digital Terrestrial Television (DTT) [5], online platforms [6] or the historical heritage itself, including museums, theaters and centers [7]. However, the academic literature on the accessibility of SVODs is not yet abundant.

## III. SVOD ACCESSIBILITY VERIFICATION METHOD

### A. Code

In order to carry out the content analysis, a table of indicators with 37 variables has been drawn up that contains the criteria established by the AENOR standards for Accessibility: *UNE 153010 de mayo 2012 del Subtitulado para personas sordas y personas con discapacidad auditiva* [8] and *UNE 153020 de enero 2005 de la Audiodescripción para personas con discapacidad visual* [9]. The code has been based on the following criteria:

General criteria	SVOD analyzed (V1)	
	Type of product analyzed and own production (V2)	
	Genre (V3)	
	Position in the suggestion list grill (V4)	
	Language available for audio (V5)	
	Language available for subtitling (V6)	
	Language available for audio description (V7)	
	Sing language option (V8)	
Adaptation of the quality of the subtitling to the 2012 AENOR standard	Visual aspects	Position of the subtitles (V9)
		Position of the sound effects (V10)
		Number of text lines (V11)

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		Staticity of text lines (V12)
		Different text lines by characters (V13)
		Minimum character size (V14)
		Typography (V15)
		Color contrast between characters and box (V16)
		Temporal aspects: exposure speed of subtitling and synchronism (V17)
		Separation of subtitles and their background (V18)
		Identification of characters
	Maintaining the color assigned to each character (V20)	
	Color difference (V21)	
	Use of labels (V22)	
	Use of hyphen in dialogues (V23)	
	Sound effects, contextual information and music	Sound effects subtitling (V24)
		Use of sound effects (V25)
		Contextual information subtitling (V26)
		Contextual information presentation (V27)
		Music subtitling (V28)
	Editorial criteria	Presentation of music subtitling (V29)
		Text division and character limit (V30)
	Voice-over	Grammatical and spelling criteria (V31)
		There is voice-over (V32)
		Voice-over presentation (V33)
		Distinction between voice-over and character voice (V34)

Adaptation of the quality of the audio description to the AENOR standard of 2005	Locution (V35)
	Audio description script (V36)
	Audio (V37)

Table 1: Criteria for determining the code variables for content analysis.

### B. Requirements

To avoid the ‘filter bubbles’ of the SVOD algorithm, which conditions the content that the platform offers the users based on their previous searches to show them similar content [10]; it is recommended to create a new account in the SVOD that you want to analyze, prior to applying the methodology. This makes it possible to observe the platform ‘without bias’ beyond the positioning of audiovisual products set by the SVOD itself.

The selection criteria for the products to be analyzed will be determined by the need to obtain a heterogeneous, random and representative sample. In the case of search by section and genre, the first product shown by each SVOD in the genre lists must be analyzed. The films will be analyzed in their entirety, while in the serial programs —programs and series— the first episode of the first season will be chosen as the representative episode. Because series and films are generally the best-ranked product in the suggestion lists, non-random selections will be made to add other products —such as documentaries or shows— to the sample in order to increase their heterogeneity.

All subtitles and audio descriptions shall be analyzed in the same language.

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