



**PlusMe: Transitional Wearable Companions  
for the therapy with children with  
Autism Spectrum Disorders**  
*a European funded project*

**Deliverable 3.2**  
***Website development, stage two***

Work Package 3 *Dissemination*  
due at month 16 ( 31<sup>th</sup> December 2021).

Lead beneficiary: CNR  
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Project duration 18 months (September 2020, February 2022),  
Project coordinator National Research Council of Italy,  
Institute of Cognitive Sciences and Technologies, ISTC-CNR.

# 1. Overview of the deliverable

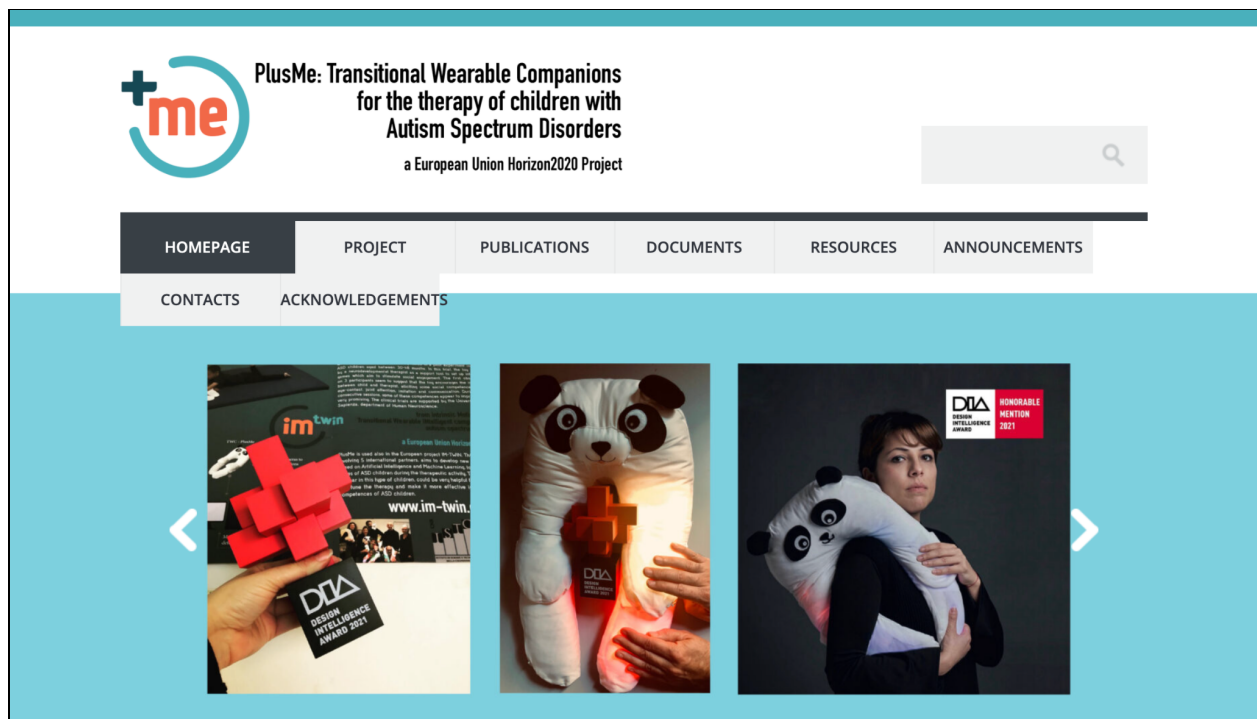
This deliverable describes the advancements of the project website, available at the address [www.plusme-h2020.eu](http://www.plusme-h2020.eu). The document is an update of the previous public deliverable D3.1 *Website development, stage one* available at the address [www.plusme-h2020.eu/deliverables/](http://www.plusme-h2020.eu/deliverables/).

## 2. Additional website materials

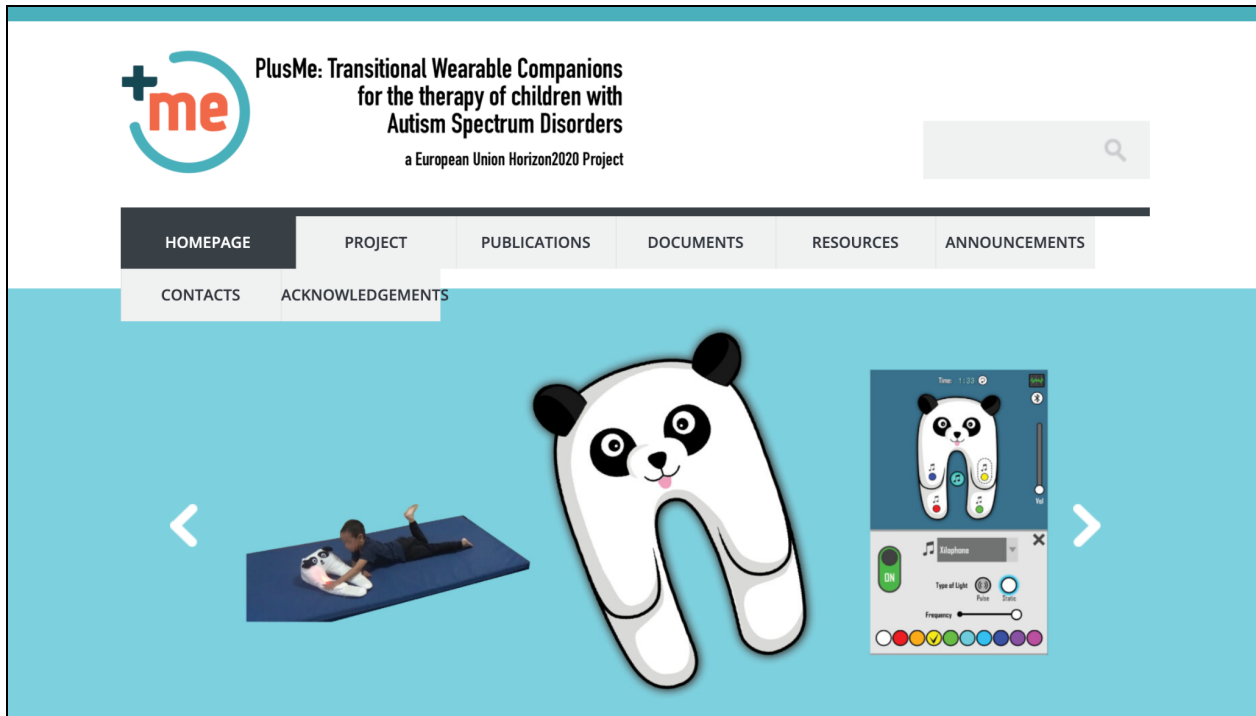
Since the beginning of the project, the website was enriched with more visuals, videos, information, documents and additional menu segments. Such new features are described in the next subsections.

### Homepage Slider

Recent news, updates and developments regarding the project have been added to the Homepage slider to have an instant and overall progress (see Figure 1 and 2).



**Figure 1.** A screenshot of the first slider in the homepage, showing the Design Intelligent Award obtained in 2021 for *PlusMe* concept.



**Figure 2.** A screenshot of the second slider in the homepage, showing the novel features of the new control App of PlusMe.

## 2. Publications page

The published article to the “23rd International Conference on Human Computer Interaction, HCI International 2021” has been added to the publication page, available at the address [www.plusme-h2020.eu/publications/](http://www.plusme-h2020.eu/publications/). The page provides all the relevant information as shown:








X-8: an experimental interactive toy to support turn-taking games in children with Autism Spectrum Disorders, B. Özcan, V. Sperati, F. Giocondo, G. Baldassarre; *Extended abstract presented at 23rd International Conference on Human Computer Interaction, HCI International 2021; published in Stephanidis C., Antona M., Ntoa S. (eds), HCI International 2021 - Posters. HCII 2021. Communications in Computer and Information Science, pp 233-239, vol 1419, Springer, Cham, DOI: [10.1007/978-3-030-78635-9\\_32](https://doi.org/10.1007/978-3-030-78635-9_32).*

### 3. Documents page

The document tab provides 3 new pages, described in the following sections.

#### Deliverables


This page provides a table with the project deliverables, available for free downloading as pdf files (see Figure 3). A Gantt chart which illustrates the project activities is also available at the end of the page.

HOME PAGE	PROJECT	PUBLICATIONS	DOCUMENTS	RESOURCES	ANNOUNCEMENTS		
List of deliverables							
Time-ordered deliverables							
Number	Title	WP	Beneficiary	Type	Dissemination level	Due at month	date
 D1.1	identification of a research partner for engineering +me	1	CNR	Report	Public	2	31 Oct 2020
 D3.1	website development , stage one	3	CNR	Website, patents	Public	2	31 Oct 2020
 D5.1	POPD Requirement No. 6	5	CNR	Ethics	Confidential	6	28 Feb 2021
 D1.2	engineering process of +me	1	CNR	Report	Confidential	9	31 May 2021
 D2.1	experimental phase, stage one	2	CNR	Report	Public	9	31 May 2021
 D3.3	dissemination of research activities, stage one	3	CNR	Report	Public	10	30 Jun 2021
 D1.3	+me product demonstrator	1	CNR	Demonstrator	Public	15	30 Nov 2021

**Figure 3.** A screenshot of the *Deliverables* page.

## Intellectual Property Rights

This page provides information about the Intellectual Property Rights concerning the project. Currently, the logo *PlusMe* is an European trademark, registered at EUIPO (the European Union Intellectual Property Office, see Figure 4).

HOMEPAGE	PROJECT	PUBLICATIONS	DOCUMENTS	RESOURCES
IPR			DELIVERABLES	
Homepage / IPR			IPR	
			WORKSHOPS & PRESENTATIONS	
<h1>Intellectual Property Rights</h1> <h2>Trade mark</h2> <p>PlusMe is an EU trademark.</p>				
		<ul style="list-style-type: none"><li>• Name: +ME</li><li>• Filing number: 018509222</li><li>• Filing date: 06/07/2021</li><li>• Type: figurative</li><li>• Nice classes: 9,10,42,44</li><li>• Owner: Consiglio Nazionale delle Ricerche</li><li>• EUIPO link: <a href="#">here</a></li></ul>		

**Figure 4.** A screenshot of the IPR page, showing the data about the *PlusMe* trademark.

## Workshops and Presentations

This page provides information about activities for the dissemination of project results. Currently the page hosts an overview of the workshop held at the Department of Human Neuroscience, University of Rome *La Sapienza* (see Figure 5).

### Workshop at University of Rome *Sapienza*

The CNR-ISTC, in collaboration with the Department of Human Neuroscience of the University of Rome *Sapienza*, organised a workshop about the *PlusMe* device and the related experimental activities. The workshop was held in Rome on July 16 2021, at the Department of Human Neuroscience, Section of Child and Adolescent Neuropsychiatry. Additional information can be found in the public deliverable [D3.3 Dissemination of research activities, stage one](#).

**Downloadable media**

	 Workshop flyer (pdf format)
	presentations (available soon)

**Figure 5.** A screenshot from the Workshops and Presentations page.

## 4. Resources page

The resources tab provides 3 new pages, described in the following sections.

### Hardware and software

This page will host open source GitHub repositories containing both software and hardware (e.g electronic diagrams concerning *+me*, software for the control of the device, etc.) which can be shared as “open source”, with users interested in replicate the device for scientific use only (e.g. researchers from other labs).

## Textile Materials



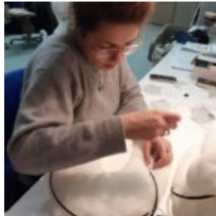

This page provides information about the textile materials used to develop PlusMe (see Figure 6), as technical report and useful links.

### Innovative textile materials

#### Safe and fireproof fabric




All textile materials used in *+me* (i.e. the inner padding, the inner Tulle fabric, the external envelope) are safe and fireproof. More specifically, the external cover is realised using an hypoallergenic, biodegradable, white cotton treated with COEX® technology: this patented technique makes natural fibres inherently fireproof and free of additives. The fabric is in fact obtained by modifying the molecular structure of the cellulose fibre, so that the product does not burn, creating a protective barrier against fire. COEX® cotton maintains its properties throughout its life span. More info on the website [www.coex.pro/intl/en](http://www.coex.pro/intl/en).

We thank COEX S.r.l. for kindly donating the cotton fabric for *+me* project.

			
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#### Conductive fabric

Touch-sensitive areas on *+me* are realised with the *Knitted superlight conductive fabric*. This is an extremely light and transparent, conductive, copper textile which can be cut with scissors and sewn with a standard sewing machine. More info on the website [www.inntex.com](http://www.inntex.com)

		 <a href="#">Knitted superlight conductive fabric technical description</a>
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**Figure 6.** A screenshot of the textile dedicated page.

## Video

This page provides several videos which show the features of the new prototypes developed within the project (see Figure 7). Currently the following six clips are available:

- PlusMe functional features;
- Experimental sessions (May-June 2021);
- Previous experimental sessions (year 2020);
- The Octopus X-8;
- The new PlusMe prototype by IMM CNR;
- The new PlusMe control app.

## PlusMe functional features

This video shows the functional features of the current experimental prototype, used in two pilot experiments with Typically Developed children (TD) and with children diagnosed with Autism Spectrum Disorders (ASD) and Communication Disorders (CD).

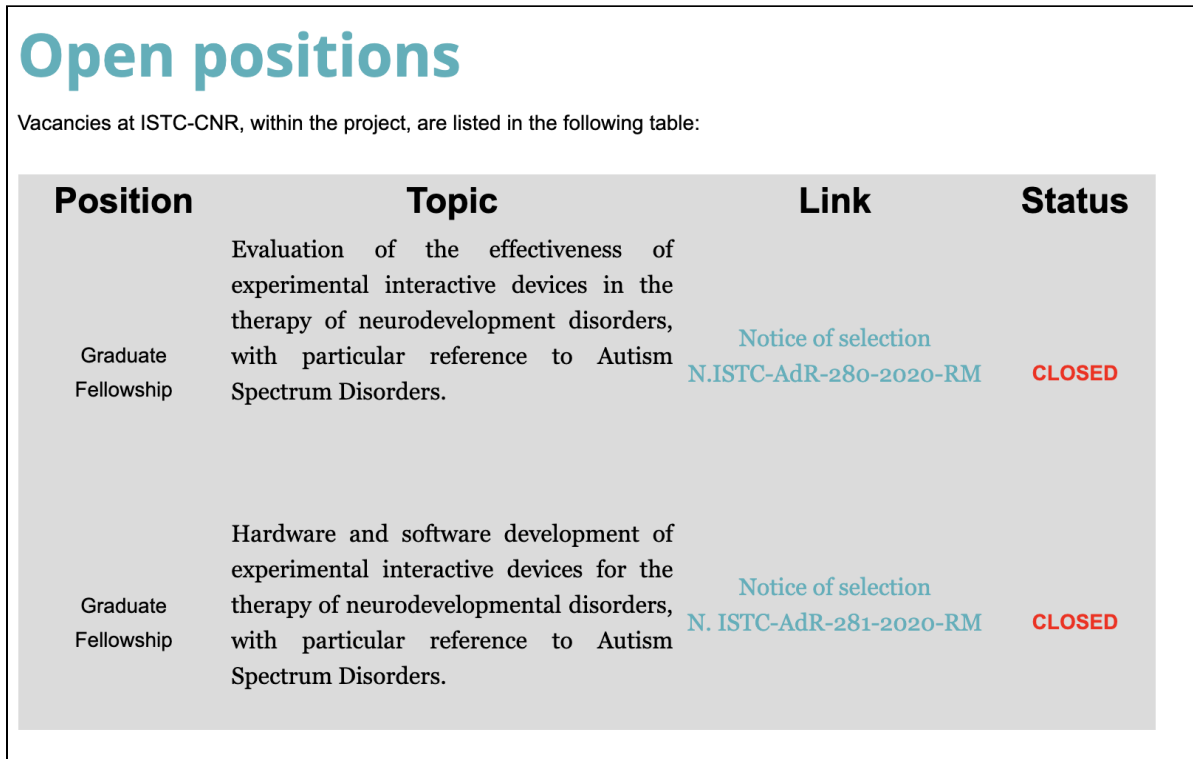


**Figure 7.** A screenshot of the Video dedicated page.



## 5. Announcements

This page provides useful information (position, topic, link, status) about the open positions at ISTC-CNR within the project (see Figure 8).



**Open positions**

Vacancies at ISTC-CNR, within the project, are listed in the following table:

Position	Topic	Link	Status
Graduate Fellowship	Evaluation of the effectiveness of experimental interactive devices in the therapy of neurodevelopment disorders, with particular reference to Autism Spectrum Disorders.	<a href="#">Notice of selection N.ISTC-AdR-280-2020-RM</a>	CLOSED
Graduate Fellowship	Hardware and software development of experimental interactive devices for the therapy of neurodevelopmental disorders, with particular reference to Autism Spectrum Disorders.	<a href="#">Notice of selection N. ISTC-AdR-281-2020-RM</a>	CLOSED

**Figure 8.** A screenshot of the dedicated page showing the current vacancies.

## 6. Acknowledgments

This page reports the acknowledgements to people, institutions and companies which kindly contributed to the project results.

## 7. Future development

The website will continue to be updated with novel materials, documents, videos showing the progress of the project. This is the last deliverable about the project website.