



This work carried out with the financial support of the *Grand Plan d'investissement*, the *Région Nouvelle Aquitaine*, the *European Union* and *ADEME* as part of the "La Rochelle Territoire Zéro Carbone" project.

REFERENCES TO HELP US

Is what I imagine to be an eco-designed IT service, really a sustainable IT service?") An IT service consists of a set of software, terminals and infrastructures (networks and data centers).

For accessibility, in France the General Reference for Improving Accessibility (RGAA) R.G.2.A. (or the WCAG abroad), and the resources provided by DINUM are very effective tools for designing inclusive digital services.

For design and development, the sustainable design standard HB491 of the ISIT covers the 3 dimensions of sustainable IT: Planet, People, Prosperity. It was then used as one of the sources by DINUM to produce the General Repository for the Ecodesign of IT Services (RGESN) (R.G.E.S.N.) and by AFNOR (AFNOR) to establish Afnor Spec 2201 (SPEK 22.01).

The HB491 offers nearly 500 criteria divided into 8 families, referring to different sectors of activity related to the sustainable design of IT services:

- The strategy ,
- The specification phase,
- The user experience (UX design)
- The Content definition,
- The Architecture,
- The production of frontend and backend codes
- And finally, the hosting.

Some of the HB491 criteria are qualified as essential, representing some forty something central questions for Sustainable IT technology. These criteria respond to the different stages of design or redesign of a project, as described by the AFNOR SPEC.

During the phase of expression, definition and prioritization of requirements, we will question these requirements in order to:

- Create long lasting value,
- Reduce the superfluous and rebound effects,
- Evaluate the environmental and human impacts, and monitor these with accurate metrics.

Then comes the UX design, during which we address frugality, eco-design, consistency between the 3Ps and handling end of life, to ensure that the service meets users' expectations.



This work carried out with the financial support of the *Grand Plan d'investissement*, the *Région Nouvelle Aquitaine*, the *European Union* and *ADEME* as part of the "La Rochelle Territoire Zéro Carbone" project.

The implementation phase focuses on development and incorporates:

- The targeted hardware,
- The Coding,
- The data or the graphics,
- The Optimizations,
- The Sizing,
- The Supervision,
- The Mutualisation
- And the capitalization of service elements.

This stage could be followed by a new UX design phase.

During the use and operation phase, we monitor the 3Us (useful, usable, used), the adaptation of resources compared to the use of the service and we make users aware of the impacts of their use. The preventive, corrective and evolutionary maintenance phase permits continuous improvement and takes into account technical or regulatory updates.

And finally, the last phase, disposal, ensures the future of data, software components, hardware and targets waste reduction (WEEE) D.3.E. (W3E).

With all parties involved in the project, you have the opportunity to act to reduce the impacts and bring value to the IT service that you will have helped to build sustainably.