

Marketplace development to facilitate the Sale and Purchase of Carbon Credits



The client was established by WWF and other international NGOs to ensure projects that reduced carbon emissions featured the highest levels of environmental integrity and also contributed to sustainable development. They launched the best practice standard for climate and sustainable development interventions, creating value for people around the world and the planet we share.

The Challenges

Client's objective was to add branding, a label to existing and new carbon credits generated by projects which can then be bought and traded by countries that have a binding legal commitment according to the Kyoto Protocol. They required critical and sensitive sustainable development indicators as well as monitoring of compensation measures over the entire credit period; these indicators were included in the verification report. They were facing the below challenges while contributing to sustainable development.

- Tedious Data keeping, retrieval, and analyses (Most data were present in the excel file, emails, and documents)
- Critical man-days lost in activities like data capture, retrieval, analyses, and follow-ups
- Data Accuracy and reliability were compromised due to manual interventions.
- Due to the absence of centralized existence of past projects data, painstaking benchmarking and feasibility analysis
- The absence of a centralized repository makes the correlation of audit findings and learnings vis-a-vis the project difficult and cumbersome.
- Due to multiple stakeholders spread across different organizations, streamlined communication and information sharing were challenging.

Quarks Solution

We executed all aspects of the solution: ideation, definition, design, development, and maintenance to help the Client in realizing business benefits. We started by bridging the gap between a business analyst or developer and a subject matter expert on climate change followed by the below activities:

- Mapping the processes, activities, data generation points, reporting requirements, and analytics requirements.
- Defining the attributes, functionalities, data capture, and analytics requirements of a software tool/product.
- Wireframe development to capture functional requirements.
- Role-based access control for different types of users from different organizations.
- Provisionings for capturing data and workflow of all related activities for the project timelines
- Following best practices around data integrity and security
- Automating the processes and Tools Development.

The Benefits

Efficient Data Keeping, retrieval, and analyses (Centralised database and in-app analytics)

Man-hours saving due to process automation and tools.

The centralized existence of project data resulted in data accuracy, reliability, efficient benchmarking, and feasibility analysis.

Correlation between audit findings and learning vis-a-vis projects became prompt and easy.

Easy and Proactive communication through automated reports and alerts.