Customer Success Story

healthdirect Australia

healthdirect Australia is a health and medical information portal funded by an Australian government consortium. The platform bundles content from over 140 specialized information providers. Users benefit from valuable and quality-assured medical information, which is made accessible through smart semantic search applications. The back-end semantic solution is provided by PoolParty.

The challenge

The Australian population lives in areas far from direct medical services. Before taking a ride to see a doctor, most often search queries in commercial search engines substitute for professional advice in the first place. To live up to this reality, a highly specialized information portal was established.

The solution

healthdirect Australia is built on semantic technologies that intelligently combine digital assets. The "vocabulary hub" harmonizes metadata repositories of different information sources. Information integration was essential to improve the search interface. When users search for information, they get multi-media content recommendations that closely relate to their initial topic, even though the search name might be completely different. Semantic capabilities such as faceted search and autocompletion enable non-experts to do specialized research.

The results

End-users have a single point of entry for verified medical information. Due to semantic functionalities, the portal navigates website visitors to context-relevant content. Smart features as the Symptom Checker were developed. Based on a semantic intelligence network, a questionnaire adapts dynamically to the users answers and delivers reliable content. The traffic of healthdirect increased 140% over a year. Information partners also benefit through the content syndication as healthdirect navigates users to their sites. As the results are convincing, the project is getting supported by decision makers. New semantic functionalities will be included in the future and add to the portal’s continued growth.

Overview on technologies and content workflow of healthdirect Australia
PoolParty is a semantic technology platform developed, owned and licensed by the Semantic Web Company. The company is also involved in international R&D projects, which have a continuous impact on the product development. The EU-based company has been a pioneer in the Semantic Web for over a decade.

**Project insights**

**How to develop semantic intelligence**

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**STEP 1: BUILD A KNOWLEDGE GRAPH**
Content intelligence starts with a bullet-proof taxonomy. healthdirect didn’t need to model the medical knowledge from scratch. The information architect profited from MeSH, a publicly available thesaurus, which is build and sustained by the US National Library of Medicine. He easily imported it to PoolParty. Approximately 90% of the existing controlled vocabulary was directly applied to the healthdirect knowledge graph. As Australian English differs from American English, some linguistic adaptations were required.

**STEP 2: ALIGN THE CONTENT WITH THE KNOWLEDGE GRAPH**
You need metadata to put information into context. The content of healthdirect and 140 affiliates is analyzed in the PoolParty module entity extractor and matched against the knowledge graph. Automatic tags are generated, which can be manually adapted by the content manager, if necessary.

**STEP 3: INTEGRATE THE TECHNOLOGY STACK SMOOTHLY**
The substantial multi-media content volume and the content syndication with external partners is challenging. PoolParty works as a semantic middleware in a heterogenous and complex system architecture. Due to its very flexible REST API, PoolParty integrates frictionless with most Content Management and Digital Asset Management Systems.

**STEP 4: CARE ABOUT MANAGEMENT BUY-IN**
PoolParty is an excellent tool to build and develop a sustainable semantic information architecture. During the working process, healthdirect discovered many ways of adapting the methodologies to their specific needs. Experts clearly see the business benefit of expanding the semantic technologies within their framework. Now they should invest personal energy in internal selling to the right stakeholders. Decision-makers must better understand why semantic technologies are essential for their effective content business.

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**REACH OUT TO THE PROJECT TEAM**

Do you want to know more? We are happy to connect you with our customer and consultant.

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