A Semantic Data Platform for Context-Enabled Search, Discovery, & Analytics in Data-Driven Enterprises & Organizations

3RDi – Relevant | Deep | Insights

Overview

- ▶ Search, Mine, Discover, Analyze, Research

- ▶ Semantic Context-Driven Search & Text Analytics

- ▶ High Performance and Scalable

- ▶ Support Multiple Data Centers

- ▶ Ready-to-Use Enterprise Ready Domain Packs

- ▶ Pluggable Rich and Interactive Visualizations

- ▶ Pre-Shipped Adapters for data sources

- ▶ Support for Cloud Deployments and Multi-tenancy

- ▶ Run on any device – Mobile, Web

Many data-centric organizations spend significant amounts of time and resources to acquire, aggregate, clean, enrich, standardize and manage data, content & information to make it available, accessible and discoverable to either drive operational efficiencies or line revenues.

Lack of advanced context-driven user-friendly Google-like search engines in the enterprise landscape has resulted in sub-optimal utilization, monetization and ROI on data investments. 3RDi - our Enterprise Search, Discovery & Analytics platform powered by an advanced semantic-search engine helps organizations find, discover, analyze, research, publish and monetize diverse, vast and complex datasets from their data assets, semantically link it and present it for consumption within new or existing business applications & workflows, thereby resulting in faster ROI and gaining a competitive edge.

Our semantic data-platform enables rapid data utilization & monetization within data-driven enterprises and is supported by our managed data & applications engineering and support services providing end-to-end data & solutions lifecycle management.
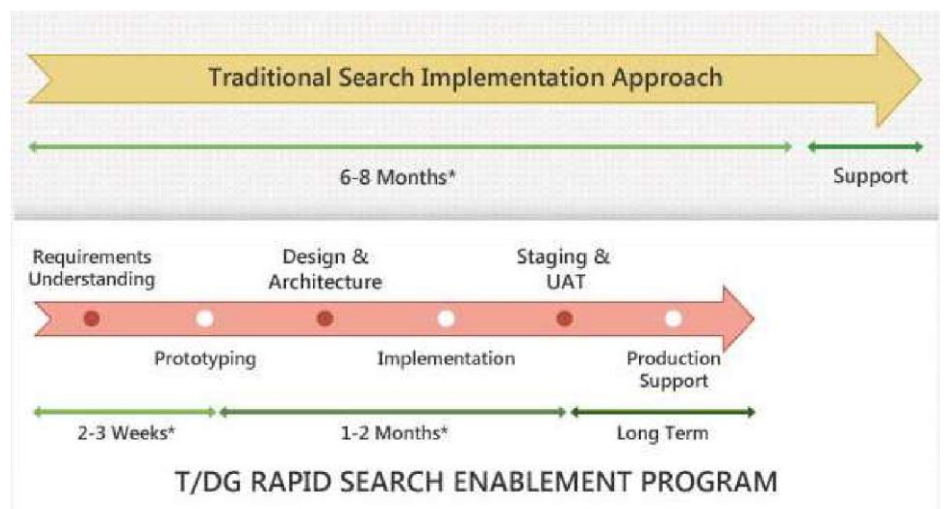
The T/DG 3RDi Advantage

With extensive experience in implementing feature-rich enterprise search solutions for our customers across many industries, we at T/DG offer a comprehensive end-to-end Rapid-Enterprise-Search-implementation program, spanning the full solutions lifecycle.

We work closely with your business and engineering teams to first understand your unique challenges, requirements & data monetization strategies and then rapidly (and this is key) synthesize a custom solution based on our semantic search platform tailored to your unique needs. A typical 3RDi Rapid-Search - Implementation engagement would cover discovery, conceptualization, planning, design, engineering, implementation & support in the following areas:

- ▶ Data Acquisition, Aggregation, Integration Rapid
- ▶ Data Shaping, Enrichment & StandardizationSearch
- ▶ Search, Discovery & Semantic RelevancyCapacity &
- ▶ Iterative Customer-Driven Prototyping Managed

- ▶ 3RDi-Accelerated Search Implementation
- ▶ Relevancy Testing & Tuning
- ▶ Infrastructure
- ▶ Support Services

Our 3RDi-platform-based Rapid Enterprise Search implementation cuts down development and release cycles and costs by at-least 50-60% and empowers organizations with cutting-edge semantic search & discovery capabilities with faster time-to-market cycles at significantly lower costs across Capital, OPEX and TCO perspectives.

While "Search" will be at the core of all 3RDi-based solutions, what you get is a much broader set of comprehensive data capabilities that span data acquisition, search, research, discovery, data mining, & analytics, allowing you to leverage organizational data assets to the maximum.
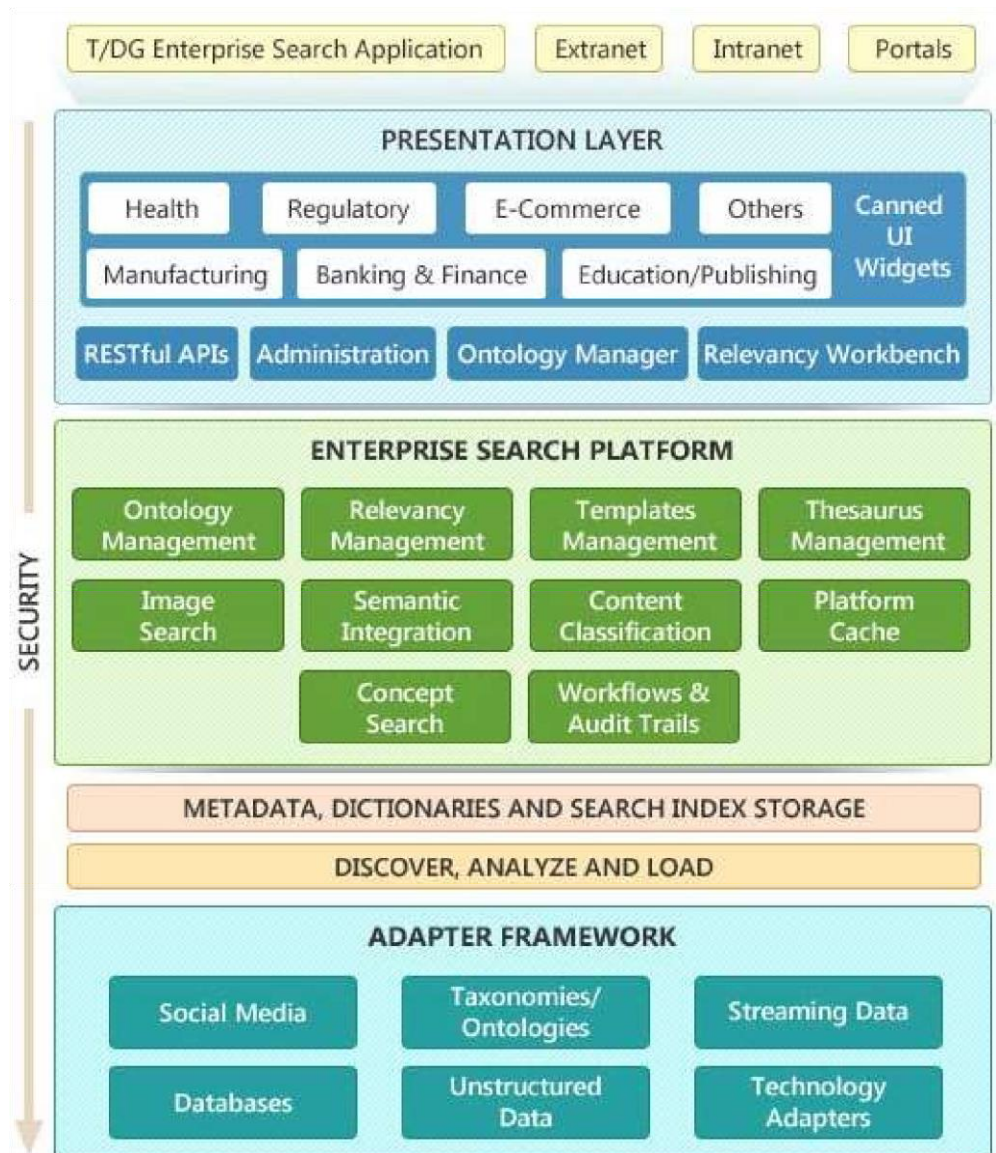
Features

▸ Domain Specific Semantic Enrichment

▸ Document Categorization

▸ Rich Relevancy Workbench for Search Configuration

▸ Vocabulary Support

▸ High Speed Talend based Data Ingestion

▸ Auto Summarization and Near Dupe Identification

▸ Integrated Statistical and Advanced Analytical Algorithms i.e. Clustering, Forecasting etc.

▸ In-build Recommendation Engine for Context specific Support

▸ Image Search Capabilities

▸ Integrated Test-Automation Suite

▸ Complete Lifecycle Management through Rich Admin Console

3RDi – Product Architecture

Our 3RDi platform has a multi-tiered cross-platform architecture with several modules and subsystems.

An adapter-framework is responsible for securely identifying, analyzing and indexing content from different types of data sources across your organization both on-premises or from cloud.

Vocabulary Support

- WordNET 3.1
- Yago
- DBPedia 2014
- UNESCO 2.0
- Euro Voc 4.3
- MESH 2015
- UMLS 2015
- UIMA 2.7
- CTakes 3.2.2
- SnowMED CT 2015
- T/DG Semantic Vocabulary (V 1.2)
- Custom Taxonomies (SKOS-RDF)
- Custom Ontologies
- Legacy Vocabularies

Supportability

- Solr 5.2.1
- UIMA 2.7
- Tika 1.7
- Sesame 4.0
- Spark 1.4.1
- Hadoop 2.7.1
- Cassandra 2.0

The Semantic Integration subsystem manages semantic and contextual linking and enrichment of data using NLP (Natural Language Processing) techniques, dictionaries, vocabularies, taxonomies & ontologies – that cover generic, domain-specific and custom taxonomies and ontologies. A thesauri and ontology manager provides capabilities to tune industry standard vocabularies as well as to define and manage organization or domain-specific vocabularies.

3RDi Search capabilities also extend beyond text search with image search capabilities using different image matching & text extraction algorithms.

Search Relevancy is always a significant challenge in most search implementations and is usually a major time-consuming and non-trivial sphere of focus and effort. The 3RDi Relevancy module is an extremely powerful declarative relevancy tuner and manager that provides a single unified workbench for your power-users and search administrators to manage and maintain search relevancy – without any programming or search engineering knowledge.

The platform cache subsystem is designed to enhance the caching layer over conventional search engine cache architectures. It is designed to work with application specific requirements, predict user behavior so as to reduce cache misses, and to speed up search response times. It addresses some of the common search problem patterns such as deep pagination, heavy result sizes, multiple session loads and high frequency terms.

Our platform is built on top of some of the most widely used and mature open source technologies and frameworks, with Apache Lucene at its core. Workflow and audit trails are used to monitor and control the changes in search behavioral changes, and any new enhancements in taxonomies.

A presentation layer offers widgets for search visualizations & workflows.

There are various ready-to-use UI widgets that can be plugged into any standard CMS, portal or any other web based application. It also exposes RESTful APIs for external consumption.