PTC® Live Global

PART 108 Google for Work Applications: Enterprise-Class Collaboration and Search Integrations for PTC Windchill

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- Introductions & Fishbowl Overview

- Google for Work Applications Overview

- Fishbowl's Google for Work Solutions
    - Google Drive integration with PTC Windchill
    - Google Search Connector for PTC Windchill

- Questions?

Fishbowl, PTC, & Google

Partnering with businesses to solve costly and frustrating knowledge sharing problems.
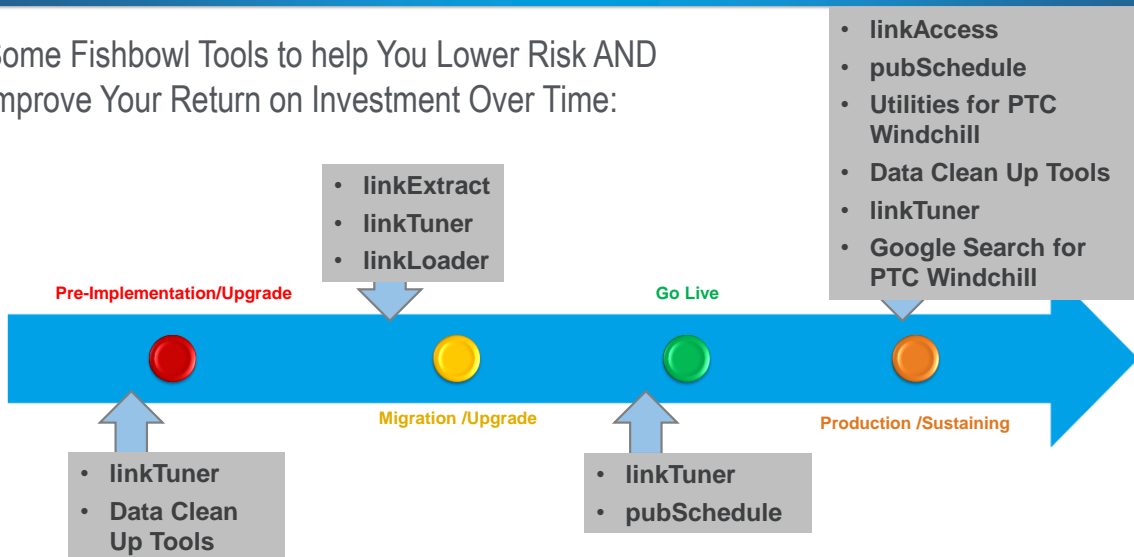
- Exceeding Customer Expectation Since 1999
- Gold Level Software Member of PTC Partner Advantage
- Windchill & Creo Expertise – 100s of projects
- Google Enterprise Partner
- 3 certified GSA Deployment Specialists

fishbowl
SOLUTIONS

PTC
PartnerAdvantage
Gold
SOFTWARE ●●●●●

Google for Work
Partner

PTC Windchill Experts

Some Fishbowl Tools to help You Lower Risk AND Improve Your Return on Investment Over Time:

- **linkAccess**
- **pubSchedule**
- **Utilities for PTC Windchill**
- **Data Clean Up Tools**
- **linkTuner**
- **Google Search for PTC Windchill**

- **linkExtract**
- **linkTuner**
- **linkLoader**

Pre-Implementation/Upgrade

Go Live

Migration /Upgrade

Production /Sustaining

- **linkTuner**
- **Data Clean Up Tools**

- **linkTuner**
- **pubSchedule**

Enterprise Search across Business Systems
Jumpstart services and software leveraging the Google Search Appliance

Product Development Automation
Software and consulting services to streamline manual and repetitive PDM and PLM tasks

Quality Document Management & Control
Simple, robust software to streamline document authoring and review and automate overall policy and procedure management

Self-Service Portals
Jumpstart services and software for Employee Intranets, Partner Extranets and Global Customer/Supplier Portals

User Experience & Mobile Design and Development
Responsive and adaptive design for desktop and mobile

- Spending too much time looking for and recreating content

- **Collaboration process separated from design process because of disconnected systems**

- Finding content requires paging through a lot of noise

- **Non-Windchill users don't have access to relevant existing in the system**

- No way to suggest search terms to users to help direct them to relevant content

- **Poor relevancy of search results within business system**

- Multiple names for the same thing mean users find only some relevant content or must perform multiple searches

- Inability to report on what users are searching for

- Inability to promote or feature specific content items or content groups

- Difficulty segmenting content by metadata, source, or other categories

- **Associating collaborative content to PDM/PLM content requires many manual steps**

- Difficulty translating content across multiple languages

- Tools that provide security and reliability **to work the way you live**

- Google Apps
  – Gmail
  – Hangouts
  – Calendar
  – Docs
  – **Drive**

- Google Search
  – Google Site Search
  – **Google Search Appliance**
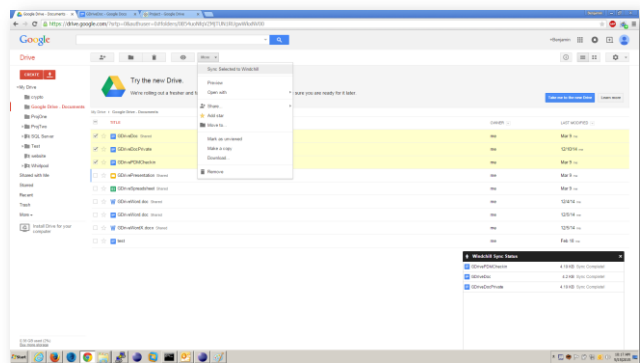
Google
Apps for Work

Google Search for Work

- Store, sync and share files from any device

- Support over 40 file formats

- Permission based access controls

- 15 GB of FREE storage
  – Premium versions includes more storage
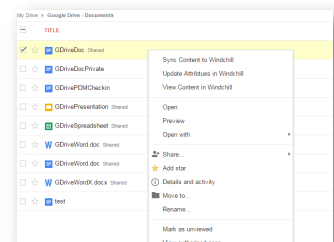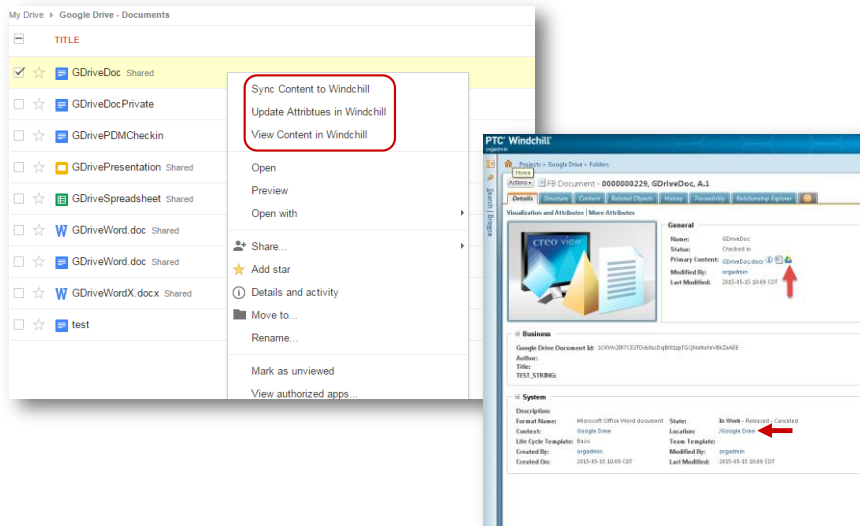
- 240 million active users

Google Drive

- **What is it?**
  - Configurable interface application to publish content from Google Drive to PTC Windchill

- **What business problems does it solve?**
  - Keeps documents/data in sync between systems
  - Ensures final versions of in-process (collaborative) content gets published to Windchill
  - Enables organizations to utilize best-in-class collaboration and PDM/PLM systems *together*

- **What are some use cases?**
  - Product managers iterating on new products/new features before design phase
  - Test engineers conducting tests and sharing results to get feedback
  - Marketing teams collaborating on case studies and product positioning documents

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- **Interface**
  - Google Drive button (icon)
    - Publish – add new document to PTC Windchill
    - In Sync – documents are in sync between systems
    - Update – re-publishes document to PTC Windchill
      - Check in form presented allowing users to change attribute values
  - PTC Windchill
    - Attributes icon that informs users what documents have been published from Google Drive
    - Link from Windchill to open document in Google Drive

- **Supported Content**
  - Engineering Documents / Project Documents
    - 8D, A3, FMEA, DVP, CPM, Guidelines, etc.

- **Security**
  - PTC Windchill Basic Authentication leveraged when users are adding/updating documents
  - User must have write access to project in Windchill
  - Read-only documents available in PTC Windchill and document deletes must occur from PTC Windchill
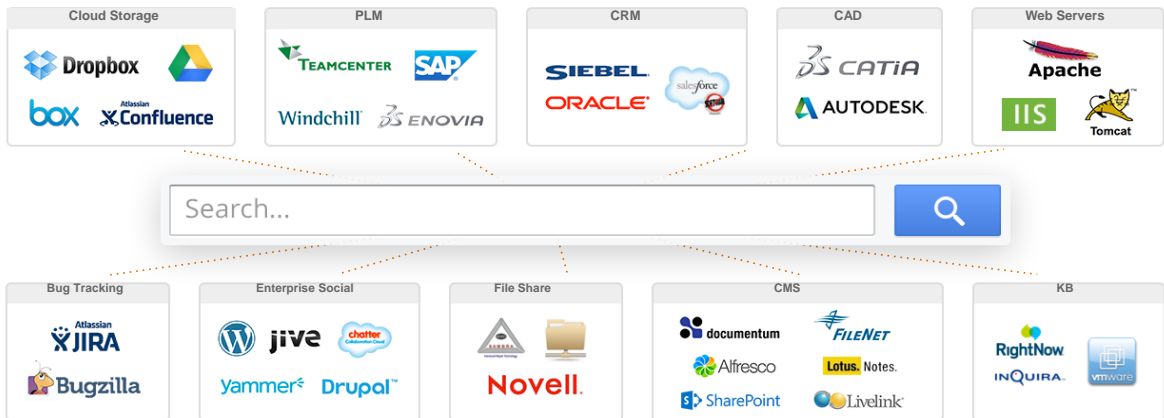
Google
Apps for Work

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Google Search for Work

- Scalable hardware solution
  - Index up to 100 million items on a single appliance

- Google-like search experience for your organization's internal systems and data

- Provides
  - Query interpretation, relevancy algorithms, document previews, user-added results, dynamic navigation, and more…

Fishbowl's GSA Connector – Evolution

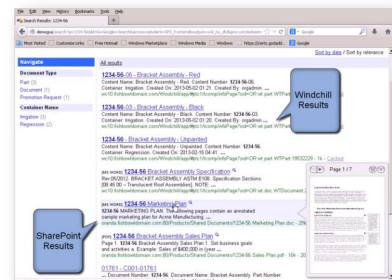| Version	Focus
Version 1.0 June 2014	Feed items from PTC Windchill to the GSA for indexing
Version 2.0 Jan 2015	Support for Early Binding Authorization Ability to search and return product and library results from PTC Windchill ProjectLink and PTC Windchill PartsLink

- What is it?
  - Configurable connector that securely feeds PTC Windchill items to the GSA for indexing

- What business problems does it solve?
  - Provides a single search interface to search across multiple content repositories
  - Enables LOB employees to access information in PTC Windchill - for collateral creation (drawings, etc.)
  - Less programming/search tuning and more finding

- What are some use cases?
  - Non-Windchill users – provide access to content
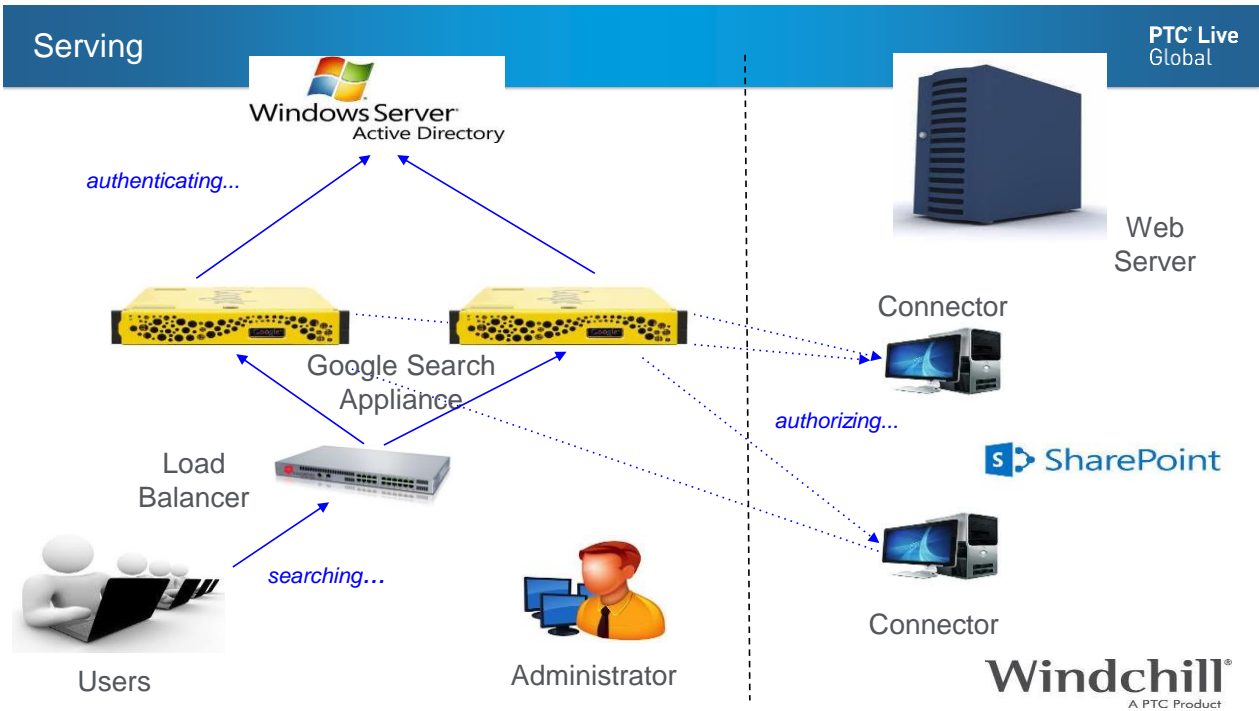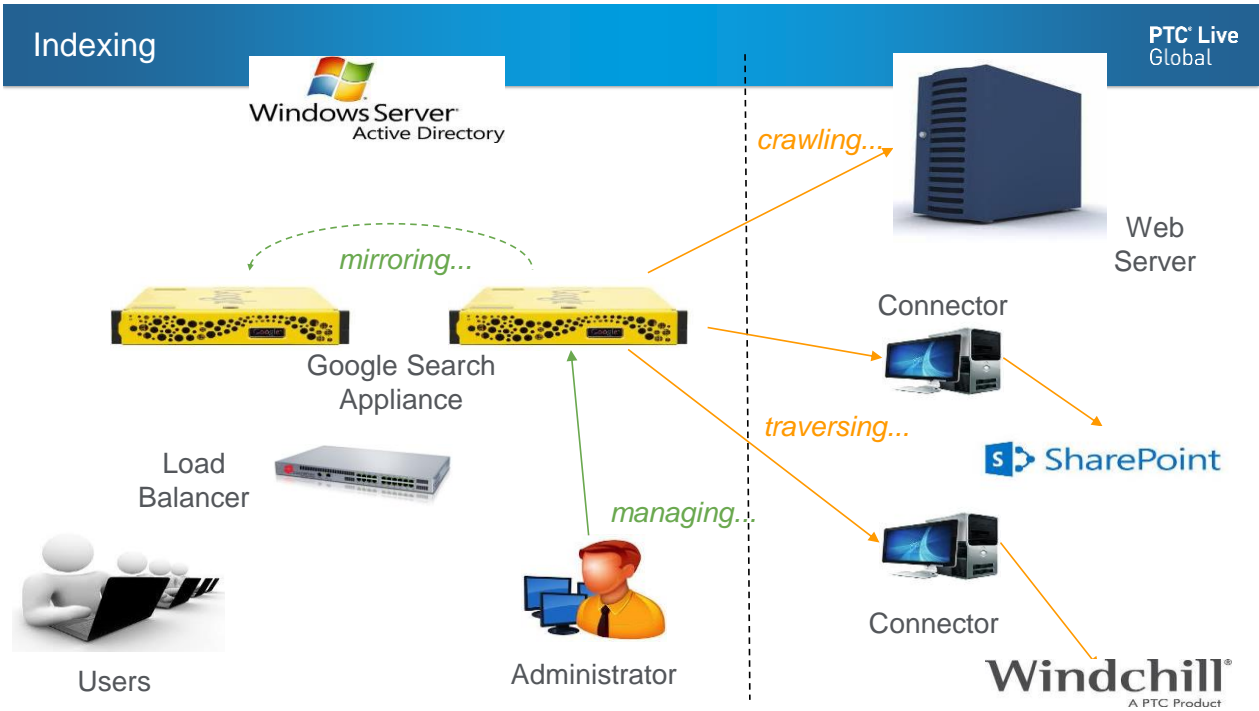 - Enterprise or Federated Search across multiple repositories
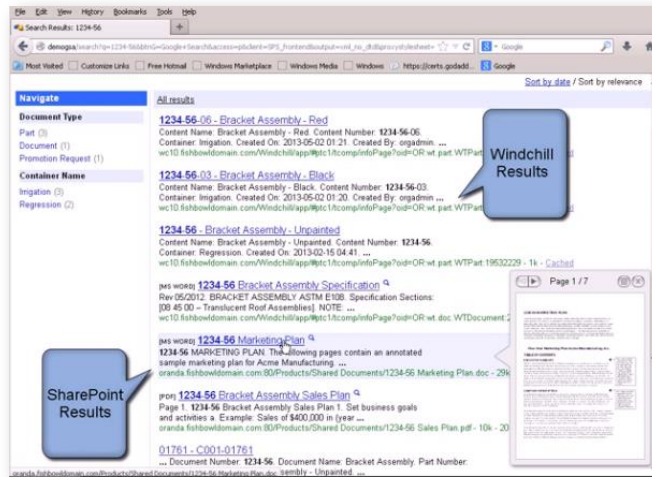

Windchill®
A PTC Product

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- Supports Documents (including CAD), WTParts, Promotion Requests, and Change Objects

- Intelligent Content Feed
  - PDF Viewable when available
  - Native Content for selected types
  - Dynamic HTML for other objects

- Higher Priority Event Driven Feeds
  - Check-in, Revise, Promote, Delete, etc…

- Lower Priority Crawl (for existing content)

- Early binding authorization for role-based assignment of both users and groups to individual products and libraries

- Searching PTC Windchill ProjectLink and PTC Windchill PartsLink

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Indexing

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Windows Server Active Directory

mirroring...

crawling...

Web Server

Google Search Appliance

Connector

traversing...

SharePoint

Load Balancer

managing...

Users

Administrator

Connector

Windchill® A PTC Product

Serving

PTC Live Global

Windows Server Active Directory

authenticating...

Web Server

Google Search Appliance

Connector

authorizing...

SharePoint

Load Balancer

searching…

Users

Administrator

Connector

Windchill® A PTC Product

Summary – Fishbowl's Google for Work Solutions

- Google Drive Integration for PTC Windchill
  - Satisfy user requirements for easy collaboration tools with back-end infrastructure, security and storage
  - Ensure data integrity between systems
  - Expedite CAD process and overall time to market

- Google Search Appliance Connector for PTC Windchill
  - Provide a Google-like search experience that users have come to expect
  - Less time searching more time finding
  - Reduce duplication of effort
  - Ensure high-value content can be found regardless of where it is stored

See Fishbowl Solutions in Booth #404

- Demos of our Google for Work Applications

- Discuss our solutions for PTC Windchill, Pro/INTRALINK, PDMLink, Creo (Pro/ENGINEER)

- Enter to win Bose Headphones

- Rockets!

POWERED BY
Google

Windchill®
A PTC Product

linkTuner

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- Your feedback is valuable

- Don't miss out on the chance to provide your feedback

- Gain a chance to win an instant prize!

- Complete your session evaluation now

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