SEMICONDUCTOR FOR IP CLASSIFIER

OBJECTIVE

Semiconductor IP Classifier enables users to organize a company's globally dispersed intellectual property (IP) in a catalog, facilitating search and compare and enabling efficient design reuse. The IP catalog can be tailored to the company's product and business environment, presenting different classified views depending on the user's access rights.

OVERVIEW

Time-to-market in the semiconductor market has become the critical factor in generating profit early in a product's lifecycle. Product complexity and the breadth of products have outpaced the productivity gains needed for companies to maintain a competitive advantage. Tools that increase the rate of development for product content are essential for improving design and production efficiencies.

Reuse of product content has shown a 70% savings in product design time. The infrastructure for cataloging, finding, and managing reusable data is a key element to realizing these savings. Since an inefficient reuse system can diminish the actual savings, a system that fits the company's business and data needs will inevitably enjoy better adoption rates and is essential for translating this potential savings into bottom line profits.

Semiconductor IP Classifier enables users to access product content libraries tailored for their specific needs and provides simple and efficient search and navigation capabilities. Whether using the hierarchical tree-browser or the powerful parametric search capabilities, it is quick and easy for users to search library repositories thoroughly to find the best available match for their criteria. This in turn maximizes the reuse achieved and the savings returned on the investment in the company's IP.

Semiconductor IP Classifier also provides an interface to semiconductor data managed by designers with **Software and System-on-a-Chip Designer**. Design data can be moved directly to the IP reuse catalog or can be linked directly into the catalog by references, allowing the original to remain in the work-in-process server.

HIGHLIGHTS

Key features and capabilities include:

Parametric Searches and Comparisons

The powerful, yet simple to use, search capability makes it easy to locate product content based on complex sets of reuse criteria. Searching across different units of measure is simplified as the software automatically compares the specified search criteria against the database regardless of how the parameters were captured originally. An advanced comparison tool further analyzes search results to identify differences for ranking alternatives. The simplicity of the search tools encourages end users to look for the best available content always, instead of settling for the first adequate content encountered.

Library Classifications Relying on Access Roles

Users work with libraries that have been defined with classification taxonomies unique to their access role*. The same content may exist in more than one library, but it can be browsed and searched within the role-specific taxonomy of just one library. This makes it very easy for each role to share a common database and still find data from within the context of their own domain.

(*) Note: The creation of libraries and taxonomies is done using **Classification Manager** (CCM).

Library Security

A flexible access control mechanism allows librarians to determine which users and/or roles have access to the library classification structures. Only specified users can view and navigate the libraries, the library structures, and the content. Limited access can be granted to allow users to navigate the data, but not download classified content or IP. However, users can then request download access from the librarian for the given IP, which may be granted on a temporary basis with a time limitation for downloads.

Document Management

End users can classify product content from any ENOVIA® solution or be configured to create new product related documents of any type. Each document type can be assigned unique release processes and access controls. As a document proceeds through its lifecycle, different user roles can have access to download its files or upload a new version. When making changes, the document can be locked to visually cue other users that a change is being made.

Electronic Review Processes

The system can be optionally set up to enforce cross-functional reviews of library content before releasing it to a broader group of end users. Routes are used to circulate the content to select individuals for review and approval. Route creation and setup can be simplified further by the use of route templates, which pre-define the steps that must be followed. All users can benefit from capabilities such as password verification, password aging, password format checks, failed attempts logging, and requiring two administrators to alter a user's password.

Notification of Changes

Users can subscribe to automatic notifications for key events such as new content additions to the library or changes made to classified items. Subscriptions can be attached to entire libraries or to individual components. Notification comes in the form of automatically generated email and can include attached descriptions and links to the relevant library or components for easy navigation. This means that users making use of data from the library can make decisions based on up-to-the-minute status of issues and updates, rather than static knowledge captured at the time of reuse.

Semiconductor IP Taxonomy

An industry standard taxonomy based on attributes from the VSI Alliance (VSIA) standard and the Global Semiconductor Alliance (GSA) enables companies to customize classification definitions quickly to meet a specific product and IP needs.

Semiconductor Design Data File Upload and Download

Deliverables are linked directly to semiconductor data. Users can browse the semiconductor design data directory hierarchy, view the content, and checkout/check- in as required. A centralized enterprise-wide system can work with multiple project-level DesignSync® servers across the organization or multiple project-level systems may be set up.

Key Benefits:

- Work with library classification systems that match their role's unique needs.
- Classify existing product content from other ENOVIA® applications or create new product documents.
- Search libraries based on all parameters associated with its classes with automatic unit of measure conversions.
- Request additional "download" access from a librarian after reviewing library content for items of interest.
- Participate in peer reviews before content is made available to the rest of the organization.
- Subscribe to library updates and additions to stay informed of critical product content changes.
- Use a semiconductor taxonomy and attributes as defined by VSIA.
- Easily catalogue semiconductor design data.

GLOBAL COLLABORATION

Collaboration & Approvals

Users can benefit from a wide range of capabilities for global enterprise collaboration. Those capabilities include the ability to manage and organize shared documents and structured product data; they also enable the creation of digital workspaces for virtual teams to work together. Users can easily raise issues, organize meetings and track decisions. Any object lifecycle modifications can be formally approved using routes defined by end-users or from standard route templates.

Microsoft Integration

Users can create and access **3D**EXPERIENCE® data from the most popular Microsoft applications: Word®, Excel®, PowerPoint®, Outlook®, Windows Explorer, and Windows Desktop Search. This capability enables enterprise-level collaboration while not disrupting the established productivity of end-users. With product content being managed in **3D**EXPERIENCE rather than on users' PCs, organizations are able to create, manage and review product content more securely.

Our **3D**EXPERIENCE® platform powers our brand applications, serving 12 industries, and provides a rich portfolio of industry solution experiences.

Dassault Systèmes, the **3D**EXPERIENCE® Company, provides business and people with virtual universes to imagine sustainable innovations. Its world-leading solutions transform the way products are designed, produced, and supported. Dassault Systèmes' collaborative solutions foster social innovation, expanding possibilities for the virtual world to improve the real world. The group brings value to over 190,000 customers of all sizes in all industries in more than 140 countries. For more information, visit **www.3ds.com**.

3DEXPERIENCE®

DASSAULT SYSTEMES | The **3D**EXPERIENCE® Company