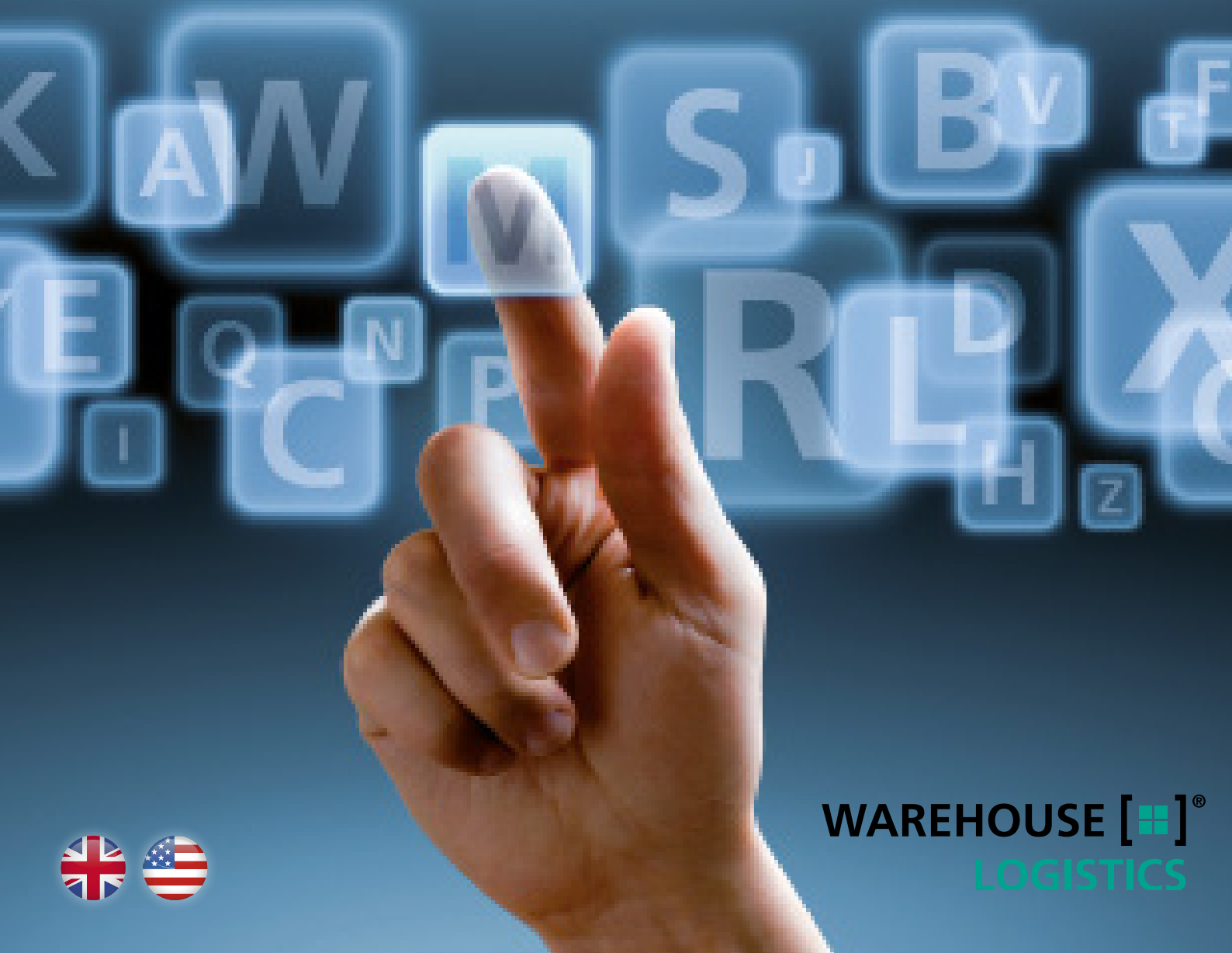


A-Z

WAREHOUSE LOGISTICS



WAREHOUSE [][®]
LOGISTICS



WAREHOUSE LOGISTICS – FROM A TO Z

TIPP

Bolded words are described in the guide

Since it first went live in 2000, the warehouse logistics platform has been enhanced and improved on an on-going basis and it is now one of the largest and most comprehensive platform of its kind in the world. Over the years, the number and functionality of the warehouse management systems (WMS) available in the market have increased considerably and the services and size of **Team warehouse logistics** have grown in step. Users and consultants value warehouse logistics as an information platform for the selection of a system and as the first place to go for news about the latest developments and trends in the WMS market. **WMS Online Selection** allows users to utilize more than thousand aspects of the **WMS Database** to select the right WMS to meet their needs. Together with the support of **regional partners**, Team warehouse logistics is systematically pressing ahead with the internationalization of the platform– for example in Italy, France, and the Benelux countries – with the goal of helping with the acquisition of new customers and tapping into new markets. The exclusive opportunity to meet with other WMS vendors at the annual **participant meeting** and exchange ideas and knowledge further underscores the successful marketing and community aspects of the platform.

»warehouse logistics – from A to Z« will provide you with an overview of the wide range of services and functionality offered by warehouse logistics. It will also help you get started on warehouse-logistics.com by giving you tips on how to do everything from entering and updating your **company profile**, answering the **WMS Database questionnaire** to the initial creation of **WMS Reference Projects**.

Your Team warehouse logistics

The Team warehouse logistics is available for any questions about the validation process and for any general enquiries:

Team warehouse logistics

Fraunhofer-Institut für Materialfluss und Logistik (IML)

Joseph-von-Fraunhofer-Str. 2–4

44227 Dortmund

Phone: +49 231 9743-214 | Fax: -162

Email: info@warehouse-logistics.com

GETTING STARTED ON WAREHOUSE-LOGISTICS.COM

GETTING STARTED ON THE WAREHOUSE LOGISTICS PLATFORM

Log in to <http://www.warehouse-logistics.com> by entering your user name and password in the upper-right corner of the home page. Once you have **logged in**, your own personal dashboard called **»my warehouse logistics«** is displayed in the main pane. You can use your dashboard to access the **Content Management System (CMS)** to manage your company profile. In addition, you can use it to update your **WMS Reference Projects** and access the **WMS Online Selection** as well as the **WMS questionnaire** to prepare for the **validation process**.

CREATE A COMPANY PROFILE

To attract as many potential customers as possible, we recommend that you create a **company profile** that is as complete and appealing as possible. If it is not possible for you to do this right away, then you should at least create a profile that contains basic information about your company and products, including location and contact information. If you have any questions or encounter any problems, please do not hesitate to contact your personal adviser. After you have logged in successfully, click the CMS link on your **»my warehouse logistics«** dashboard page and then click **»Profile page«**.

Profile page	WMS	Platform	Administration	Contact	Close the window	
Overview	Company information	Product information	News	Location and contact information		

MANAGE YOUR COMPANY INFORMATION

Click **»Company information«** to enter basic information about your company. Anything you enter here is published on the **»Participants and Systems«** section of warehouse-logistics.com under the name of your company.

You can enter information by clicking **»New entry«**. You can use the **»Company description«** section to briefly describe your company and the **»History«** section to provide information on the founding and development of your company.



You can enter your company information in all **languages** that warehouse logistics is available in (for example, German, English, Dutch, French and Italian). Entering information in another language will allow international visitors of the platform to learn about your company.

MANAGE YOUR PRODUCT INFORMATION

Click »Product information« to enter information about your warehouse management systems that are listed on warehouse logistics. The information you enter here supplements your **company profile** on the »Participants and Systems« section of warehouse-logistics.com.

Enter information by clicking »New entry«. Complete all required fields, then save what you have entered. Like with the company information, you can enter the text separately in all languages that warehouse logistics is available in.

Furthermore you can upload product flyers and screenshots of your WMS. Additionally you can send us all the information and we will place it on your page in the »Participants and Systems« section. Contact your personal adviser at **Team warehouse logistics** about how to do this or send the screenshots by email to marketing@warehouse-logistics.com.

ENTER NEWS

Click **»News«** to enter press releases and current information of your company. Most important prerequisite for the news to be released is a direct – or indirect but for a neutral observer obvious – relation to WMS.

MANAGE YOUR LOCATION AND CONTACT INFORMATION

You can click »Location and contact information« to enter or modify location and contact information about your company. The information you provide here will help visitors get in touch with the right person or office in their area. You can choose in which order your locations and contacts should be shown on the platform. It is possible to display only specific contact information, depending on the chosen language. You can enter location and contact information by clicking »New entry«.



BENCHMARKING

- Members of the **WMS Database** are given the opportunity to make extensive use of the validated WMS information. Each member can access **WMS Online Selection** twenty times and use it to compare the functionality and requirements of their system with other systems and identify their own strengths and weaknesses.



CERTIFICATION

- Warehouse logistics has been certified in accordance with DIN EN ISO 9001:2015 since the summer of 2017. This certification guarantees a software **validation process** that is high in quality and objectivity. WMS users value the neutral expert status of the **WMS Database** and feel confident in selecting a suitable WMS on its basis. This quality seal also ensures that the warehouse logistics platform is being improved continuously and that the results of the yearly **customer satisfaction analysis** receive special attention.

COMPANY PROFILE

- Each participant in the **database** has a company profile page reserved for them on warehouse logistics. The information on this page can be edited in the **CMS**, such as company information, product information, brochures, **news**, or **reference projects**. The edited information is published in the »Participants and Systems« section on warehouse logistics under your company name.



CONTACTS

Please do not hesitate to contact us with any comments, suggestions, or questions

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CONTACT ► Regional contact partners (Italy)

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CONTENT MANAGEMENT SYSTEM (CMS)

- Once logged in, **WMS Database** participants can access the Content Management System (CMS) provided by warehouse logistics. The CMS has five categories: Profile page, WMS, platform, administration and contact.
- In the category »profile page« you can add your company and product information. Furthermore you can upload **news** as well as location and contact information.
- In the category »WMS«, the organizational aspects of the **validation** are arranged. Additionally, here it is possible to add **WMS Reference Projects**.
- Every month you can view information about all users who registered for free express- or reference access to the site that month in the »Platform« section of the CMS. This information could be used to acquire new customers. We generate a **quarterly report** at the beginning of each quarter for each WMS Database participant, which contains many interesting statistics and can be downloaded easily in the CMS. Additionally the sections »download area« and »statistical evaluation« belong to the menu item »Platform«. Here it is possible to download different statistics and presentations.
- In the category »administration« you can edit your user data and change your password.
- Click on »contact« to get all advisers of **Team warehouse logistics** with their individual phone number at one glance.

CONTROL DOCUMENT

- After the WMS of a vendor has been successfully validated, the vendor is provided with the validated **questionnaire**, including all deviations that were found in the entered data, for them to check. The validated data is then released for usage in the **WMS Database**.

COOPERATION PARTNERS

- **Team warehouse logistics** cooperates with specialist partners to generate mutual added value and realize common interests and goals.
- The current cooperation partners of the team warehouse logistics come from the areas of print media, digital media, consulting companies and institutes.



CUSTOMER SATISFACTION ANALYSIS

- A customer satisfaction analysis is conducted on an annual basis for the **WMS Database** on warehouse-logistics.com to analyse the quality, user behaviour, and future requirements of the WMS Database. The contact person for each participating company is sent an online questionnaire. After the customer satisfaction analysis has been performed, the participants are provided with a summary of the results.

DATABASE

- See **WMS Database**

DATES

- See **Events**

DIAGRAMS

- The menu item »diagrams« represents the fourth and last step of the **WMS Online Selection**. The user gets an overview of the, in the evaluation considered warehouse management systems, proportional fulfilment levels. Those can be broken down to the single functional aspects of each validated **questionnaire**. Additionally the user has the possibility to get to your profile page as well as to your **WMS Reference Projects** with only one click or even contact you directly via email. The product comparison offers an easy option to compare the warehouse management systems on a technical basis directly with each other. The user can choose, which functional areas should be considered for the product comparison. Furthermore the fulfilment levels of the systems are shown in the functions overview. The average value overview affords the opportunity to see at one glance how much a WMS deviates from the average in the single functional aspects. Additionally it is possible to see the best WMS for a single functional aspect in the Best-In-Class diagram. The diagrams can be downloaded as PDF.



EDIT USER DATA

- You can edit your user data by clicking »Administration« in the **CMS**. The contact data that is displayed here is the data that is used by **Team warehouse logistics** to communicate with the participants in the **WMS Database**. It is not the contact information that is displayed in your **company profile**.

ELEVATOR PITCH

- You can insert information up to a maximum of 350 signs for example to point out some of the following aspects: regionality, focus on branch, size of the provider, target customers and further products of the portfolio. The brief description will basically be shown as a short note as mouseover-effect (e.g. logo) in the **WMS Online Selection** and on the »Participants and Systems« page.

EVENTS

- All of the important events in the intralogistics industry are listed chronologically on the warehouse logistics platform. Any events held by the participants of the **WMS Database** are also listed on the platform as soon as we receive the information from the participant. All of these events are given even more exposure through their inclusion in the **newsletter**.
- **Team warehouse logistics** is an exhibitor at many of the trade fairs in the intralogistics industry. These events are always announced in the newsletter and on the platform.

EXPRESS VERSION

- Express version provides users with a quick look at suitable WMS vendors. This access is free, however it provides comprehensive insights for the user into functionality and methodology of the WMS Online Selection. In addition to K.O. criteria a selection of functional requirements can be weighted by the user. The result of the **WMS Online Selection** is displayed in numerous graphics containing all relevant data as well as individual results. The user has the ability to contact suitable vendors via the platform. An extended functionality to select a WMS (for example detailed weighting of all functional requirements) is offered by the charged **premium version**.



- The online platform warehouse logistics helps participating vendors acquire new customers by providing them with the contact data from the users who registered for express access. Their contact information can be viewed every month in the »Platform« section of the **CMS** and it is also included in the **quarterly report**, which is sent out every quarter.

FORGOT YOUR PASSWORD

- If you have forgotten your password, you can click »Forgot your password?« to retrieve it. You will be asked to enter your user name, then the password will be sent to the email address stored in the administration section of the **CMS**.
- If you have also forgotten your user name, we need an official, signed letter with a company stamp. This requirement is due to data protection restrictions. Your personal adviser can help you with this.
- You can change your password at any time by clicking »Administration« in the **CMS**.

FRAUNHOFER IML

- The Fraunhofer Institute for Material Flow and Logistics is known as the place for all questions about integrated logistics and is active in all fields of internal and external logistics. Fraunhofer IML was founded in 1981 and currently employs 190 scientists as well as 250 PhD students and undergraduates. It is further supported by colleagues in workshops, laboratories, and service areas. Made-to-measure arranged teams create cross-industry and customer-specific solutions in the area of materials handling, warehouse management, supply chain management, simulation supported business and system planning and also traffic systems, closed loop economy, resources logistics, building logistics and e-business. Fraunhofer IML develops, manages, and operates the Web site and the services of warehouse logistics.

INDUVATION GMBH

- See **Regional Partners**



K.O. CRITERIA

- Some of the more than 3700 aspects of the **questionnaire** could be of utmost importance when selecting a new WMS. These are called K.O. criteria and are set by the user during the **WMS Online Selection** process. The user is shown the possible K.O. criteria and decides which of them must be met by the WMS. The systems that do not meet the K.O. criteria set by the user are not included in the subsequent steps of the WMS Online Selection process and are removed from the list of possible products. This is done in the first step of the WMS Online Selection process and results in the creation of the so-called **shortlist**, which is a list of preselected systems.

LANGUAGES

- The warehouse logistics platform is now available in five languages: German, English, French, Dutch and Italian. You can change the language by clicking the appropriate flag in the upper-right corner.

LINKED PAGES

- To link your company profile page on warehouse-logistics.com, you can place the provided »Image-Tag« on your website. You can find it in the **CMS** in the section »Platform« and »Download area«.

LOGGING IN

- The access data for the **WMS Database** is sent by **Team warehouse logistics** by email. This information is required to log in to the »**my warehouse logistics**« dashboard of the platform and get access to the services provided by warehouse logistics.



MY WAREHOUSE LOGISTICS

- Once you have **logged in**, your own personal dashboard called my warehouse logistics is displayed in the main pane. You can use your dashboard to access the services provided by warehouse logistics, such as the **CMS**, **WMS Reference Projects**, the **questionnaire**, and **WMS Online Selection**.



NEWS

- The latest press releases about warehouse management systems and news about the database participants are published in the »News and Publications« section of the platform. This section also contains press releases from **Fraunhofer IML** and the **WMS Database**.
- You can use the **CMS** (»Profile Page« → »News«) to create press releases and upload current information about your company or you can send them to news@warehouse-logistics.com. **Team warehouse logistics** then links the news to your profile and publishes them. The publication of a news article on warehouse-logistics.com requires a direct – or indirect but obvious – link to a WMS related topic.
- Every 14 days **Team warehouse logistics** checks the Web sites of all database participants and looks for any new WMS-related content that can be added to the **company profile** on warehouse-logistics.com. They also monitor intralogistics trade journals for any relevant articles about the database participants and, with permission from the publisher, publish them on the company's page on the platform.

NEWSLETTER

- To help keep our **database** participants up to date on all press releases, **news**, and articles, we send out a warehouse logistics newsletter every two weeks that summarizes all of these items. Participants can subscribe to this newsletter in the »News and Publications« section of our Web site and it is available in German, English, Dutch, French, and Italian.



PARTICIPANT CERTIFICATE

- The participants of the **WMS Database** receive a certificate after their WMS has been through the **validation process**. Just like with the **validation signet**, they can use the participant certificate for marketing their validated WMS. The participant certificates are usually handed out at the annual **participant meeting**. If it is not possible for a participant to attend the meeting, the participant certificate will be sent by mail after the meeting.

PARTICIPANT MEETING

- **Team warehouse logistics** invites all participants of the **WMS Database** to an annual participant meeting in Dortmund. In addition to presentations, the meeting also gives participants the opportunity to talk to representatives from the industry and make new contacts. Furthermore the so called **World Café** takes place, where the participants have the opportunity to discuss in organised round tables about innovative topics of the branch. All participants receive personalized documents as well as their **participant certificate** at the meeting.

PREMIUM VERSION

- The premium version provides - compared to the **express version** extended functionality and more detailed information about functions of WMS. This version is particularly suitable if a concrete selection process necessitates a repetitive detailed selection (for example in WMS projects). The user has the opportunity to weight in a rough or a detailed way on the degree of all functional fulfilments related to products and category of questions. The results of the **WMS Online Selection** are displayed in numerous graphics containing all relevant data as well as individual results which are downloadable as pdf-documents. Furthermore the user benefits from many additional **diagrams** (e.g. product comparison, average value overview, Best-In-Class) and a survey of non-fulfilled **K.O. criteria** by vendors. The premium version provides the results down to the single aspects of each warehouse management system.
- For participants of the platform warehouse logistics the premium version is automatically included without additional costs.



QUARTERLY REPORT

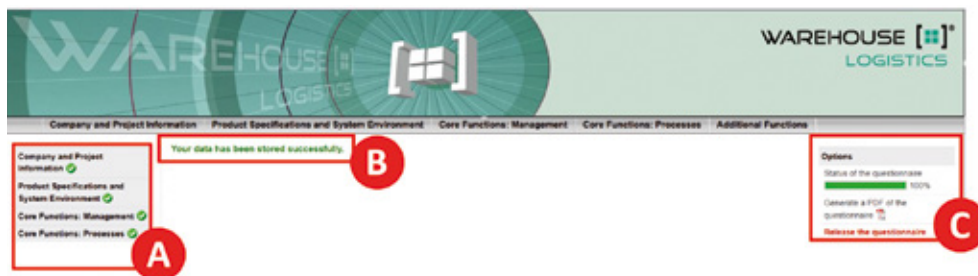
- The quarterly report contains a list of all of the new **news** items, **reference projects**, and articles that were created in the last quarter as well as a WMS-specific summary of the queries made by users of **WMS Online Selection**. The quarterly report is only available to **WMS database** participants and can be downloaded in the **CMS** under the section »Platform«. WMS vendors can see how their WMS was placed in the selection process and to what extent their WMS met the requirements of the user. If their WMS was not included in the selection process, they can see a list of the user criteria that were not fulfilled by their WMS. The quarterly report also contains the contact information of all the users that registered for the **express-** or **reference version** in the previous quarter.

QUESTIONNAIRE

- The basis of the **WMS Database** provided by **Team warehouse logistics** is a questionnaire that covers more than 3700 aspects. This results in a level of detail that shows both the individual requirements of the users as well as the functions of the WMS solutions. The WMS questionnaire is revamped and expanded every year based on the information and knowledge that Team warehouse logistics acquires during the **validation process** and **WMS Consulting** and also based on the developments in the WMS market.
- In order to be able to compare the **WMS Reference Projects** of the WMS vendors (in addition to the functionality of the WMS) and make them a selection criterion, **Team warehouse logistics** worked together with the **Warehouse Logistics Advisory Committee** to develop an additional **questionnaire** for validating reference projects.

Questionnaire ► Logging in to the Warehouse Logistics Platform

- Log in to <http://www.warehouse-logistics.com> by entering your user name and password in the upper-right corner of the home page. Once you have **logged in**, your own personal dashboard called »**my warehouse logistics**« is displayed in the main pane. You can use your dashboard to access the **Content Management System (CMS)** and manage the **questionnaire** to prepare for the **validation process**. To ensure that your WMS is available for inclusion in **WMS Online Selection** as soon as possible, you should fill out the questionnaire thoroughly and get your system validated by **Team warehouse logistics**.



Questionnaire ► Structure of the Questionnaire

The questionnaire is divided into different categories (see A in the image) which you can use for navigation. The first category includes general questions about the company, products and services as well as industry experience. The focus of the questionnaire is on capturing the functional requirements for the basic processes that are typically found in a warehouse: material and information flows from receiving to shipping. The questionnaire also covers all of the additional functionality that is required to operate a warehouse because of industry-specific requirements, product ranges, or desired degrees of automation.

Questionnaire ► Completing the Questionnaire

When you open the questionnaire, the first category is already selected and you can start filling it out. We recommend that you enter your name or abbreviation in the editor field before you start editing so that if multiple people from your company are filling out the questionnaire it is easy to see who did which part. When you have finished editing a category, click »save and proceed« at the bottom of the page. A confirmation that your changes have been saved will be shown (see B in the image) and the next category will be selected automatically. It is possible to exit the questionnaire before you have completed it or skip a category. Please note that each category has to be viewed and saved at least once (even if you did not enter anything) in order to be able to release the questionnaire for **validation**.



Questionnaire ► Release the Questionnaire for Validation

Once you have completed the last category and saved your changes, you will be forwarded to the release dialog. Here you have the option to release the questionnaire by clicking »Release the questionnaire and create PDF« so that **Team warehouse logistics** can start the **validation process**. Additionally you will get an email with the questionnaire in PDF-format to the email address stored in the administration section of the **CMS**.

There is also the possibility to release the questionnaire at a later time. Therefore click »Release the questionnaire« (see C in the image). If the option »Release the questionnaire« is not visible, this means that the questionnaire has not been completed fully and that a category was skipped or some changes were not saved. Any categories that are missing information will be displayed.

Click the option »Status of the questionnaire« (see C in the image) for an overview of the status of each category, including the date it was last edited and the name of the editor.

Catalogue of questions for the WMS Database

Functions	Date	Completed by
Company and Project Information		
Company Profile ✓	23.12.2015 10:15:28	Michael
Projects and Project Costs ✓	22.12.2015 14:29:23	Michael
Market and Sales Data ✓	22.12.2015 14:29:29	Michael
Development / Trends ✓	22.12.2015 14:29:34	Michael
Product Specifications and System Environment		
Product Specifications ✓	22.12.2015 14:29:40	Michael
System Environment ✓	22.12.2015 14:29:49	Anthony
User and Rights Management ✓	22.12.2015 14:29:55	Anthony
Multiple Languages ✓	22.12.2015 14:30:01	Anthony
Parameters ✓	22.12.2015 14:30:07	Anthony
Ergonomics (in consideration of EN ISO 9241) ✓	22.12.2015 14:30:14	Michael
Archiving ✓	22.12.2015 14:30:21	Michael
Core Functions: Management		
Warehouse Structure ✓	22.12.2015 14:30:26	Michael
Master Data Management ✓	22.12.2015 14:30:32	Michael
Inventory Management ✓	22.12.2015 14:30:39	Anthony
Transport Management ✓	22.12.2015 14:30:44	Anthony



Questionnaire ► Downloading the Questionnaire

You can download the current state of the questionnaire at any time in the editing process by clicking the option »Generate a PDF of the questionnaire« (see C in the image). The generated PDF will automatically be send to the email address stored in the administration section of the **CMS**.

REFERENCE PROJECTS

- See **WMS Reference Projects**

REFERENCE VERSION

- Reference version provides users a detailed insight into the **WMS Reference Projects**. The reference version is a separated registration, to get an access to all information of the WMS Reference Projects. This version is free of charge but gives the user anyway a deep insight into already fulfilled projects of the WMS vendors.
- The online platform warehouse logistics helps participating vendors to acquire new customers by providing them with the contact data from the users who registered for reference version. Their contact information can be viewed every month in the »Platform« section of the **CMS** and it is also included in the **quarterly report**, which is sent out every quarter.

REGIONAL PARTNERS

- **Team warehouse logistics** works with regional partners to be active in other European markets and to be able to offer a localized version of the **WMS Database**. Induvation GmbH, who is also an exclusive partner of **Fraunhofer IML**, offers the services of the platform in the Italian market.



RSS

- The warehouse logistics RSS news feed provides subscribers with the latest **news** from warehouse logistics quickly and easily, for example as a bookmark in a Web browser or with an RSS reader on a Smartphone.
- You can subscribe to the warehouse logistics RSS news feed and view some general information about RSS on <http://www.warehouse-logistics.com/88/1/rss-news-feed-abonnieren.html>.

SCORE

- A score is calculated for each functional area of a WMS after the **validation process**. This value is between 0 and 10 and indicates the extent to which the WMS fulfils the aspects of the functional area. This information can be used in the further development of the WMS or as a comparison with other WMS.

SHORT DESCRIPTION

- See **Elevator Pitch**

SHORTLIST

- The shortlist that is created in the first step of **WMS Online Selection** is a preselection of systems and includes only those WMS that meet the **K.O. criteria** for the current selection process. Any WMS that does not meet these essential criteria of the user and thus, are not in the shortlist, are not included in the next steps of the selection process. Additionally the user (only **premium version**) has the possibility to manually delete or add single WMS of the shortlist.



SOCIAL MEDIA

- Social bookmarking services (for example, Facebook, Twitter or XING) make it possible for our database participants to save their **news** or **company profile** as a bookmark or share it in a social network with a larger community. You can use the buttons at the bottom of the navigation pane on warehouse-logistics.com to use these services.

TEAM WAREHOUSE LOGISTICS

- As an interdisciplinary team of engineers, computer scientists, logistics, and marketing experts, the focus of Team warehouse logistics is on using new technologies and creative concepts to make the WMS market more transparent: a market that continues to increase in complexity. Their goal is to create a network of all market participants and work with them to develop leading-edge solutions for intralogistics challenges and increase their capabilities. Team warehouse logistics is comprised of employees from both **Fraunhofer IML** and **regional partners**. For information on how to contact them, see the **Contacts** section of this guide.

TRADESHOWS

- See **Events**.



VALIDATION

- In order to provide accurate, current, and reliable information, **Team warehouse logistics** checks the data and functional descriptions of the WMS vendors and systems in the **data-base** every year. The basis for this validation, which usually takes place on-site, is a detailed **questionnaire** that contains questions about the company, projects, and WMS. The first validation for a newly registered WMS takes approximately two days because all of the information provided by the vendor has to be validated. This amount of effort is only needed for the first year. In the subsequent years, less time is needed. The system information is validated on a »live system«, which means that the WMS vendor has to demonstrate the functionality on a test or customer installation and show that it has been used in real customer projects. This validation process is not possible in cases such as specific optimization strategies that are only visible in operational use. For these cases, the user guides, project documentation, **reference projects**, publications, or expert discussions are used to validate the data. The questionnaire must be completed online and released at least one week before the validation appointment. A WMS will be awarded a **validation signet** after all of the data has been validated successfully by the experienced and neutral Team warehouse logistics and released for use in the **WMS Database** for system comparisons using the **WMS Online Selection**.
- In addition to functional aspects, WMS vendors can also store **WMS Reference Projects** in the **CMS** and have them validated by **Team warehouse logistics** before it will be released.

VALIDATION PROCESS

- The annual **questionnaire** is already ready for participants to fill out in February every year. The **validation** takes place from March to July. Members of the team travel to the customer's site and validate the pre-completed questionnaire on-site. The validated data is then evaluated. In August, the **WMS Database** is updated with the validated data so that as of this point in time **WMS Online Selection** has access to the updated data. All participants are given a **participant certificate** that is valid for the current year at the annual **participant meeting**.
- To create a new **WMS Reference Project** both vendor and customer complete a questionnaire. As soon as a common version exists the questionnaire will be finished and released. The system sends an email with a PDF of the completed reference questionnaire to vendor, customer, and the assigned validator from **Team warehouse logistics**. Afterwards a member of the Team warehouse logistics performs the validation by telephone. The **reference**



project will be published on warehouse-logistics.com in agreement on both sides, the vendor and the customer.

VALIDATION SIGNET

- The validation signet is the certification mark in the WMS industry. After a successful **validation**, the WMS is awarded the validation signet and the vendor is sent the signet in an electronic form. The vendor can use this validation signet on their website or in brochures. You can find the signet in the CMS under the tab »Platform« in the area »Downloads«.

VERSION FOR UNIVERSITIES AND COLLEGES

- Next to the free of charge **express version** and the broader **premium version**, there is a version for universities and colleges. This version is tailored for our WMS Seminar for colleges and universities and the seminar exercises.

WAREHOUSE LOGISTICS ADVISORY COMMITTEE

- The warehouse logistics advisory committee was founded in March 2009 to provide support for the long-term development of the warehouse logistics platform. The committee has an advisory function and its role is to support and promote the future development of the portal. The main focus of the committee is on the development of warehouse-logistics.com but they also exchange news on a regular basis and are active in the early identification of trends. The committee also works to strengthen and expand the existing **WMS community**. The advisory committee has extensive knowledge and experience in the area of WMS and it is made up of maximum 10 participants from the **WMS Database**. Membership is for a period of three years and an informal application for membership can be made at any time (for more information, talk to your personal adviser). The composition of the group is oriented towards the structure of the participants.



WEB ANALYTICS

- Once a year, to the **participant meeting** a web analytics of the warehouse logistics platform is provided. This contains for example statistics to the amount of visits, page impressions and length of stay per visit. Furthermore it is shown how the user reached the website (search engines, linked pages, direct access).

WHITE PAPER

- In the section »News and Publications« there are amongst others White Papers like the **WMS Market Report** and the Project Guide for the Successful Implementation of a WMS available.

WEIGHTING OF THE FUNCTIONAL REQUIREMENTS

- The weighting of the functional requirements is the second step of the **WMS Online Selection**. In this step a custom WMS requirements profile is created which is used to sort the **shortlist** which was compiled in the previous step according to the **K.O. criteria**. The first system in the results list represents the best match for the requirements profile based on the individual weighting done by the user.
- The user of the **WMS Online Selection** can rate each functional area (general weighting) and afterwards every single aspect (specific weighting). With the **premium version**, the user can choose for the general weighting to work in standard mode or expert mode. With the **express version** it is only possible to work in standard mode. In standard mode there is only a selection between weighting or not weighting a functional group (On/Off). In expert mode the user can assign a weighting from 1 (not very important) to 5 (very important) to each functional area and then each individual aspect in the requirements profile. It is very important that each functional area that is assigned a general weighting is also assigned a detailed weighting. Any aspects that are not important at all can be assigned a weighting of 0 and they will not be included in the evaluation (step 3).



WMS CONSULTING

- During the implementation of a WMS, **Team warehouse logistics** provides consulting services to their customers that include everything from the analysis of the initial situation in the warehouse to the call for tenders and the selection and commissioning of a WMS. When helping customers with the selection of a WMS, the team normally focuses exclusively on the validated systems in the **WMS Database**. Any of these systems that meet the requirements of the customer (functional requirements but also other requirements such as references and company structure) are included in the preselection stage of the project. The team then works with the customer to determine which of these systems should be included in the call for tenders. Afterwards it is issued and a system is selected. To ensure that the commissioning is successful, Team warehouse logistics helps with the creation of all essential documents such as specifications, requirements, test cases, and acceptance reports.

WMS COMMUNITY

- A close knit community formed when warehouse-logistics.com was first launched in 2000 and it has been growing ever since. The two main focuses of this community are on exchanging information and providing support for the online portal warehouse-logistics.com. The largest group of community members is made up of all of the WMS vendors who have a warehouse management system in the **WMS Database**. Some of these companies became a part of the **Warehouse Logistics Advisory Committee**, which was founded in 2009. The annual **participant meeting** in Dortmund has already become a tradition for the WMS vendors, all of whom are invited to attend. Other members of the community come from our **cooperation partners** in the areas of print media, digital media, consulting companies, and institutes. In addition some have come through our **regional partners** as a result of our internationalization efforts.

WMS DATABASE

- The WMS Database on warehouse-logistics.com is one of the largest databases in the world for comparing the functionality of warehouse management systems. It contains the majority of relevant vendors in the market and categorizes their services and products using a **questionnaire** that contains more than 3700 individual aspects.



WMS MARKET REPORT

- The WMS Market Report was first initiated in 2007/2008 and it provides a comprehensive overview of the warehouse management systems market. The results are based on the more than 10 years of project experience that the Fraunhofer Institute for Material Flow and Logistics has in selecting and implementing WMS. The report examines the developments and trends in the market from both the perspective of the vendor and the user. The WMS Market Report is an in-depth analysis of the current market for warehouse management systems with the goal of capturing its complexity and presenting it comprehensively and transparently. The WMS Market Report is available as a free of charge **White Paper** in the section »News and Publications«.

WMS ONLINE SELECTION

- The selection of a WMS is of strategic importance for a company. Based on the data in the **WMS Database**, the **WMS Online Selection** offers a neutral WMS selection tool. It provides users the results in form of a list of software solutions that best meet their functional requirements. The users can also download all relevant data and results. The high level of detail of the data stored in the WMS Database and the consideration of more than 3500 individual aspects are what makes it possible to bring together WMS vendors and users in a perfect fit.

WMS Online Selection ► Execution of WMS Online Selection

The WMS Online Selection follows four basic steps. At first, the **K.O. criteria**, which from the users point of view has to be fulfilled in any case, are defined. In the next step, the user sets the **weighting of the functional requirements**. The weighting divides into the general weighting of the functional areas and the specific weighting of the single aspects. Afterwards the evaluation can be executed (step 3). The results are presented in the next step in different result **diagrams**.



WMS Online Selection ► Access to WMS Online Selection

There are three different options for users to access the WMS Online Selection. The **express version** is free of charge and enables the user to run one evaluation in the WMS Online Selection. With the **premium version** it is possible to execute up to 20 evaluations with a deeper level of detail. Third there is a version for universities and colleges. This version is tailored for our **WMS Seminar** for colleges and universities and the seminar exercises. For participants of the platform warehouse logistics the premium version is automatically included without additional costs.

WMS Online Selection ► Statistics WMS Online Selection

In addition to the vendor specific **quarterly reports**, which are provided every three months in the **CMS**, **Team warehouse logistics** supplies once a year to the **participant meeting** an analysis to the usage of the WMS Online Selection. Next to the monthly development of the **express-** and **reference versions**, you will find detailed statistics to the percentage selection of the **K.O. criteria** by users. In addition you will get an overview of the chosen general and specific weightings.

WMS REFERENCE PROJECTS

- In addition to the functional requirements for a software solution to support the processes in a warehouse, the expertise of the WMS vendor in the implementation of logistics concepts and their know-how and experience in the roll out of a WMS are also very important factors when making a selection. The WMS Reference Projects on warehouse-logistics.com allow users to utilize selection criteria to search for WMS projects that the vendor has already implemented. Vendors can enter projects into the **CMS** and have them validated by the customer and **Fraunhofer IML**. The basis for this **validation** is a **questionnaire** that captures project specifications. The warehouse-logistics.com platform not only provides users with one of the world's largest databases for comparing the functionality of warehouse management systems but it is the starting point in the search for detailed, comparable, and valid reference descriptions.



WMS Reference projects ► Creating a Project

WMS Reference Projects can be entered in your personal dashboard »**my warehouse logistics**«. After logging in, you will reach the »CMS« and in the sub menu »WMS« the section »Reference Projects«. Here it is possible to create new projects and manage existing ones. The Project language specifies the language used for all communication between you, your customers, and the validator.

WMS Reference projects ► Completion of the Reference Questionnaire

With each new entry of a WMS Reference Project the system sends an email to the stored contact data with the login information for this specific reference project. After logging in to warehouse-logistics.com you can open the reference **questionnaire** and capture further project specifications. You will be guided through the particular categories of the questionnaire which are listed on the left (see A in the image).

The screenshot displays the 'WMS Reference Project' questionnaire interface. On the left, a sidebar (labeled A) lists the questionnaire categories: General Information, Environment, Processes, Volume and Configuration, Characteristics, Storage and Material Handling, Equipment, and Project Review. The main area shows the 'General Information' section with a 'Completed by' field and a question: 'What is the headline or title of the reference project?' (max. of 4000 characters). On the right, a legend (labeled B) explains the status of the questionnaire: 'Visible without registration' (green), 'Visible with registration' (yellow), 'Not visible if "anonymously" published' (red), and 'Not visible, only for internal use' (dark red).

Click »Save and continue« at the bottom of each page to save what you have entered and continue to the next questionnaire category. You can always go back to a previous page and make a change. Furthermore you can disrupt your processing at any time and continue at a later time. When you have clicked »Save and continue« on the last page, a red link will appear in the upper-right corner, next to the questionnaire status bar, to allow you to release the questionnaire.



The color scheme of the reference questionnaire (see B in the image) indicates which fields contain information that is displayed and which fields do not. Some of the information is not visible until the user has registered on warehouse-logistics.com.

Click the link »Release the questionnaire« when you have finished entering all required information and confirm that you are done by clicking the »Release the questionnaire and create PDF« link on the page that is displayed.

The system then automatically sends an email with a PDF of the completed reference questionnaire to the contact data stored in the system (vendor, customer, and the assigned validator from **Team warehouse logistics**).

WMS Reference projects ► Validation of the Reference Projects

A member of the **Team warehouse logistics** performs the **validation** by telephone in approximately 14 days. This presumes an agreement of WMS vendor and customer. Any changes that the customer wants to make are noted in the system. When the **validation** has been completed, the system sends another email with a PDF of the current version of the **questionnaire** (including any modifications) to the vendor and customer contact person given for this reference project. The email contains a list of question IDs for any questions that were changed. These changes are also highlighted in the PDF.

WMS Reference projects ► Publication of the Reference Projects

Your reference projects will be published on warehouse-logistics.com two weeks after the successful **validation**. The reference project will be shown in a separate section for searches performed by users for WMS Reference Projects as well as included on your profile page. If you need to make changes to the project, contact the assigned validator or member of **Team warehouse logistics**. If you want the WMS reference project to be displayed in other supported languages, you can make a copy of the published project by clicking »Copy«. Then you can enter free text in another language and all other data will be prepopulated from the original project.



WMS Reference projects ► Evaluation of Accesses to Reference Projects

Team warehouse logistics supplies once a year to the **participant meeting** a statistical evaluation of the amount of clicks and detailed views of the reference projects. Thus you get an overview of the frequency, the reference projects are used.

WMS SEMINAR

- High-quality teaching is one of the pillars of a good university education. **Team warehouse logistics** wants to help contribute to high-quality teaching at universities and colleges and to the education of new specialists and executives. WMS Seminar provides professors at universities and colleges with a complete curriculum for the introduction to and then broadening of the topic of warehouse management systems.

WORLD CAFÉ

- The World Café takes place within the yearly **participant meeting**. The participants get the possibility to discuss in different panels about innovative, for the branch relevant topics. The results are summarized in a Management Summary and provided to all participants afterwards.

www.warehouse-logistics.com



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The functionality described in this guide may include, in part, future services of warehouse logistics. Furthermore, we reserve the right to change the scope and content of the services at any time.

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