



# Performance Characteristics Data Center Operation

Fabasoft Cloud

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Confidential

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To aid readability, the third-person plural pronoun will be used instead of gendered pronouns (e.g. they/them instead of he/him). These plural pronouns shall be used for both singular and plural references, encompassing all genders.

## 1 Fabasoft Cloud Locations

A Fabasoft Cloud location is an autonomous system operated in a particular country or at the location of a particular Fabasoft customer. Fabasoft Cloud locations are currently available in Germany, Austria and Switzerland.

At each location, Fabasoft Cloud services operate in two Data Centers located at a geographical distance of several kilometers from one another in terms of linear distance. This makes it possible to implement disaster-resistant operation measures, e.g. high protection against natural disasters. The Data Centers are designed based on the Tier III specifications of the Uptime Institute.

The Data Centers provide Fabasoft with the necessary rack space, power and cooling. In addition, they establish the connection between the Data Centers and provide internet routing. For this purpose, Fabasoft has commissioned the following subcontractors:

- for the Data Centers of the Fabasoft Cloud location Germany:
  - o noris Network AG, Thomas-Mann-Strasse 16 – 20, 90471 Nuremberg, Germany
- for the Data Centers of the Fabasoft Cloud location Austria:
  - o T-Systems Austria GmbH, Rennweg 97, 1030 Vienna, Austria
- for the Data Centers of the Fabasoft Cloud location Switzerland (until November 2018)
  - o Deltalis SA, Eielen Fort DKII, P.O. Box 65, 6468 Attinghausen, Switzerland
- for the Data Centers of the Fabasoft Cloud Switzerland (from October 2018)
  - o Colt Technology Services AG, Albulastrasse 47, 8048 Zurich, Switzerland
  - o e-shelter Datacenter AG, Hofwisenstrasse 56, 8153 Rümlang, Switzerland

Fabasoft Cloud services are operated exclusively by Fabasoft.

### 1.1 Security

The Data Centers implement the following minimum security measures:

- Electromagnetic access system
- Separation system or turnstile
- Video monitoring system
- Around-the-clock (24/7) monitoring of Data Center areas

### 1.2 Fire protection

The Data Centers implement the following minimum fire safety measures:

- Comprehensive fire alarm system
- Very early smoke detection
- Automatic gas extinguishing system

### 1.3 Power supply

The Data Centers implement the following minimum measures for power supply:

- Redundant UPS systems
- Redundant diesel aggregates
- Redundant feeds
- Redundant transformers

## 1.4 Cooling

The Data Centers implement the following minimum measures for air-conditioning:

- Redundant cooling systems

## 1.5 Connection between Data Centers

The connection between the Data Centers at each location is established via ethernet point-to-point networks. The network hardware is designed with redundancy. The connection provides for redundant paths, which are fed into each building at two different points.

The connection between the Data Centers is ensured by the individual Data Center operators. Fabasoft is provided with designated Layer 2 transparent connections.

## 1.6 Hardware and software environment used

Fabasoft protects its independence. Software products from third parties that are needed to operate Fabasoft software products in the Data Center are open source products. This means that Fabasoft is not dependent on third-party providers.

Fabasoft Cloud Services are operated based on a high-availability hardware environment. The hardware components used in the system are divided into primary and secondary components.

Fabasoft Cloud Services are made available on the primary hardware components. The primary hardware components are found in both Data Centers for the purpose of redundancy.

Data is backed up on the secondary hardware components. One of the Data Centers in each location houses the secondary hardware components in separate fire protection areas.

## 2 Service levels

### 2.1 High availability

The Data Centers generally operate 24 hours per day, 7 days per week, 52 weeks per year. With regard to availability, the following parameters are provided for each Fabasoft Cloud location and service:

- Availability of 99.9% for each observation period (quarter)

Availability is measured by two dedicated external measuring points connected to the internet via independent internet lines. A service is considered available when at least one measurement point is able to gain access.

The calculation is made using the following formula:

$$\text{Uptime} = \text{Possible Available Time} - \text{Maintenance Downtime} - \text{Unexpected Downtime}$$

$$\text{Availability} = \frac{\text{Uptime}}{(\text{Possible Available Time} - \text{Maintenance Downtime})}$$

The calculation process therefore excludes the availability during planned maintenance (Maintenance Downtime).

The following times are reserved for maintenance windows:

- Saturday from 12 a.m. to Monday at 7 a.m. CET/CEST.
- In urgent cases and with prior notice

These reserved windows will only be used for maintenance work as required. Should maintenance work be required, prior notice and documentation will be provided at <https://www.fabasoft.com/cloudservices/system-status>.

Fabasoft shall compile a report on the availability of Fabasoft Cloud Services for each calendar month, which will be made available to the customer after one calendar month, available electronically at <https://www.fabasoft.com/cloudservices/system-status>.

## 2.2 Capacity/response times

The response time for all incoming requests is measured directly at the load distributor for the Fabasoft Cloud Service using Fabasoft app.telemetry. Requests include all incoming HTTP, CalDAV, and WebDAV requests received by the load distributor.

With regard to response times, the following parameters are provided for each Fabasoft Cloud location and service:

- Average response time of under one second for all requests during the observation period (quarter)

Fabasoft shall compile a report on response times for each calendar month, which will be made available electronically to the customer after one calendar month at <https://www.fabasoft.com/cloudservices/system-status>.

A request sent using a web browser can initiate multiple requests for the load distributor. For reasons of transparency, this report also includes response times from web browsers.

## 2.3 Data security

### 2.3.1 Fabasoft Cloud

Metadata, structured data and content/documents are saved within the framework of Fabasoft Cloud's operation. This data is saved with redundancy ensured on primary hardware components at each Fabasoft Cloud location.

Metadata and structured data are stored in a relational database system and mirrored synchronously between distributed database servers on the primary hardware components. At least once per day, a full backup of metadata and structured data is performed for the purpose of database backups on the designated backup systems of secondary hardware components. In addition, transaction logs are backed up continuously to these backup systems.

The content/documents in a file system are stored on at least three file servers simultaneously (two file servers on the primary hardware components, one file server on the secondary hardware components). A complete synchronization of all content/documents to an additional backup system on the secondary hardware components is carried out once per day.

Content/documents are checked regularly for malware by an automated malware scanning service. Infected files are reported by e-mail to the administrators of the affected cloud

organization. The customer is responsible for cleaning up the infected files, as Fabasoft has no access to them. The files uploaded in the last 31 days are checked once per week. In addition, all files are checked once per month.

With regard to data security, the following parameters are provided for:

- Recovery point objective (RPO): The maximum period for which data may be lost in the event of an emergency recovery is 30 minutes.
- Recovery time objective (RTO): In the event of an emergency recovery, the time required to recover the services once the network, hardware and software infrastructure are available is a maximum of 48 hours.
- Retention time: Each backup is retained for a minimum of four months and a maximum of six months.

## 2.4 Support

Fabasoft offers 1<sup>st</sup> Level Support for Fabasoft Cloud users. Users can file a support request at any time using the Support button in the Fabasoft Cloud web interface or the Fabasoft Cloud Client. Users can also contact Fabasoft Support by phone and e-mail during the specified business hours:

Phone:

- Germany: +49 69 6435515 92
- Austria: +43 732 606162 300
- Switzerland: +41 31 310 06 43

E-mail:

- [cloudsupport@fabasoft.com](mailto:cloudsupport@fabasoft.com)

Support requests are processed in German and English.

Within the framework of the support services, Fabasoft provides for the following response times when responding to support requests:

- Response time

The response time refers to the number of hours within the specified business times permitted between the time at which the support request is received by Fabasoft Cloud Support and the first response by Fabasoft.

- Resolution time

The resolution time refers to the number of hours permitted within the specified business times before Fabasoft provides the user with a concrete proposed solution based on the specific problem described by the user and in line with state-of-the-art technology. The measurement of the resolution time begins with the technical clarification and precise description of the problem, particularly the reproduction of the specific problem by Fabasoft. The time required for customer participation (for example, the time needed for the customer to provide any additional information requested) is not counted as part of the resolution time. If, for technical and/or organizational reasons, it is not possible to provide a solution within the specified time (e.g. if it is not possible to reproduce the problem or if it is necessary to create a hotfix), Fabasoft and the customer shall agree upon an appointment and resume contact at that time.

With regard to Service Support Levels, the following parameters are provided for:

Service Package	Business hours (CET/CEST)	Response time per request	Resolution time per request
Fabasoft Cloud Professional	Monday-Friday from 8 a.m. to 6 p.m. (except public holidays)	< 2 hours	< 8 hours
Fabasoft Cloud Enterprise Fabasoft Cloud Superior Fabasoft Approve Fabasoft Contracts Fabasoft Digital Asset Management Fabasoft Personnel File	Monday-Friday from 7 a.m. to 7 p.m. (except public holidays)	< 1 hour	< 6 hours

The business hours and response times specified with the respective service package apply to the license types "Full Access", "Read and Comment" and "External Access".

Fabasoft is willing to offer an extension to the above business hours separately, for example from Monday to Sunday, 7 a.m. to 7 p.m. or Monday to Sunday, 24/7. Please contact us at [cloudsupport@fabasoft.com](mailto:cloudsupport@fabasoft.com).