

Dipl.-Ing. Steffen Kampmann, Dipl.-Ing. Li Chen, M. Sc. Lukas Volkmer

Chair of Materials Science and Nanotechnology, TU Dresden

PMN IT Information

Dresden, 17.04.2025

Contact: steffen.kampmann@tu-dresden.de, li.chen2@tu-dresden.de, lukas.volkmer@tu-dresden.de

General information – IT administration

Local Administrators:

- **steffen.kampmann@tu-dresden.de, li.chen2@tu-dresden.de, lukas.volkmer@tu-dresden.de**
- We are only contact persons for
 - Your office PC/laptop
 - Software like Microsoft Office, Origin, Solidworks etc.
 - Network printer
 - Presentation support → Laptop, Microphones, Webcams, Presenter etc.

General information - Website of our Chair

- **Public website**
 - <https://nano.tu-dresden.de/>
- **Internal area on website**
 - <https://nano.tu-dresden.de/shared/>
 - **User:** nano
Password: nano
 - Here we share helpful documents
- Click here if you want to see who is responsible for which area of our website and write to that person if you want to add something:

Publication - Profile Update on FIS (Forschungsinformationssystem) Presentation 20.04.2023

Safety - PMN Safety instructions 12.10.2023

Website - Do you want to add content to our website?

<https://nano.tu-dresden.de/shared/27>

IT services from ZIH

1. Basics

2. Communication & Collaboration

- NEW: Office phones, Microsoft Teams

3. Data storage

4. Software

5. Workstations and Server

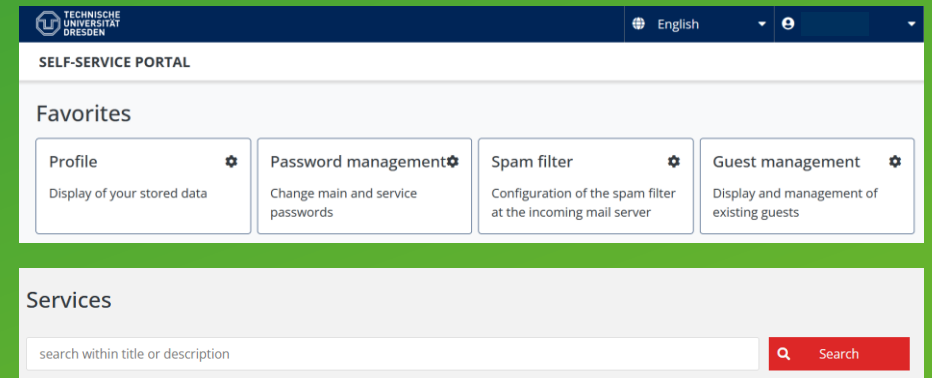
6. Security and Network

- NEW: eduVPN, Password manager

- ZIH is IT administration unit of TU Dresden
- What do I need to have access to all of that?

→ **Your ZIH credentials** ←

- To manage your *passwords* and *personal information* go to
<https://selfservice.tu-dresden.de/>
- See **all services** at glance in Self-Service Portal



For questions go at first to <https://faq.tickets.tu-dresden.de/> and then write to servicedesk@tu-dresden.de

General information – FAQ-System

- <https://faq.tickets.tu-dresden.de/>

The screenshot shows the TU Dresden FAQ system interface. At the top, the TU Dresden logo and name are displayed. Below this, a navigation bar contains the text "So verwenden Sie die FAQ richtig" and a link "Alle FAQs der TUD für Nutzende mit ZIH-Login (Kundenportal)", which is highlighted with a red box and an arrow pointing to it from a text box on the right. The main heading is "Wie können wir Ihnen helfen?". Below this, there are links for various services: BigBlueButton, Cisco, E-Mail, Einrichtung, Gruppenlaufwerk, Outlook, Softphone, Telefon, VoIP, and WebEx. A search bar is present with the placeholder text "Suche nach einem FAQ Beitrag...". Below the search bar, a note states: "Sie können auch die **Erweiterte Suche** zum Finden von Beiträgen nutzen oder Sie verwenden eines der häufig verwendeten Schlüsselwörter." Below this, there is a grid of ten service categories, each with a title and a brief description. The categories are: Datennetz, Datenschutz, Datenspeicher & Datenablage, IT-Sicherheit & Anmeldung an Diensten, Kommunikation & Kollaboration, SAP, Server-Dienste, Software & -lizenzen, and Weitere Dienste. The "Server-Dienste" category is highlighted with a red box and an arrow pointing to it from a text box on the right.

TECHNISCHE UNIVERSITÄT DRESDEN

So verwenden Sie die FAQ richtig

Alle FAQs der TUD für Nutzende mit ZIH-Login (Kundenportal)

Wie können wir Ihnen helfen?

BigBlueButton Cisco E-Mail Einrichtung Gruppenlaufwerk Outlook Softphone

Telefon VoIP WebEx

Suche nach einem FAQ Beitrag...

Sie können auch die **Erweiterte Suche** zum Finden von Beiträgen nutzen oder Sie verwenden eines der häufig verwendeten Schlüsselwörter.

Datennetz
Zugang zum Internet, Campus-Netz, eduroam, Namensauflösung mit DNS, VPN

Datenschutz
Informationen zum Datenschutz an der TU Dresden

Datenspeicher & Datenablage
Backup, Gruppen- und Homelaufwerk, Cloudstore, Archivierung, OpARA

IT-Sicherheit & Anmeldung an Diensten
Anti-Virus, Authentifizierung, Autorisierung, ZIH-Login

Kommunikation & Kollaboration
E-Learning, E-Mail, ShareLatex, SharePoint, Ticketsystem, Telefonie

SAP
SAP - Datenverarbeitung

Server-Dienste
Dienstüberwachung, Housing, Time-Server, Virtuelle Maschinen in der Cloud

Software & -lizenzen
Verfügbarkeit und Bereitstellung von Software und Softwarelizenzen

Weitere Dienste
Ausleihe von Geräten, PC Services, Remote Support, Zeitanzeige

- Click here to go to the internal FAQ section
- You can see more FAQ topics here
- you have also an overview of your tickets at the service desk (i.e. your support requests at servicedesk@tu-dresden.de)

1. Basics - Your digital ID at TU Dresden (user certificate)

- **Signing documents digitally (next slide), encrypt and decrypt**
- Type “certificate” into the search field of the self-service portal

SELF-SERVICE PORTAL

My tasks | Data protection declarations

Certificate management (Apply for user certificates and server certificates)

Service description | **Manage user certificates** | Server certificates via Sectigo | Revoke certificates of DFN-PKI | Search for certificates of DFN-PKI

On this page you can view your existing user certificates, revoke them or apply for new ones.

Request certificate

Search

E-mail	Valid until	Serial number	Status	Actions
steffen.kampmann@tu-dresden.de			valid	

Lines per page: 10 | 1-1 from 1 |  1 

Services

certificate

IT security, authentication and authorisation

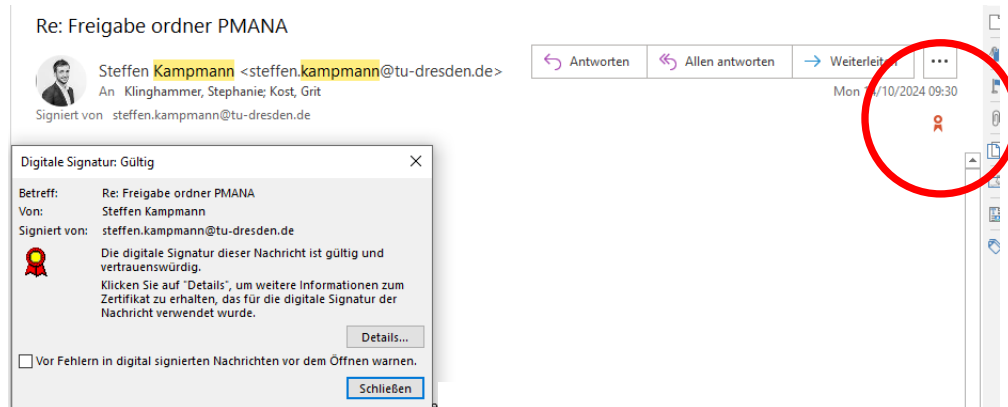
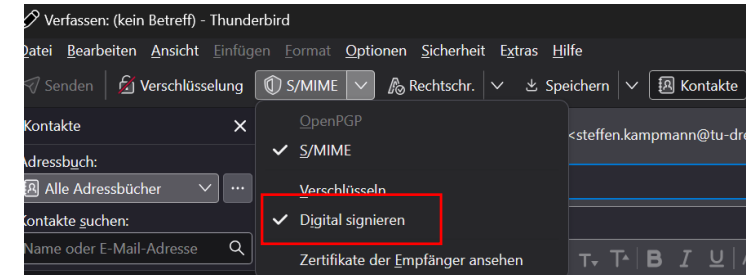
Certificate management

Apply for user certificates and server certificates

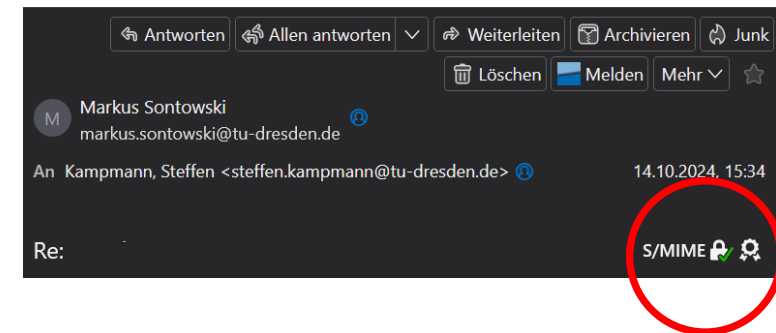
- **Request certificate**
- Service-Desk visitor address:
 - Andreas-Pfitzmann-Bau, Room E036 Nöthnitzer Straße 46, 01187 Dresden
 - <https://navigator.tu-dresden.de/etplan/apb/00/raum/542100.2480?language=en>
 - Opening hours: Monday – Friday → 08:00 – 19:00
- Full documentation: <https://tud.link/wtvyx5>

1. Basics - Use your user certificate for your emails

- After you have installed the certificate, you can select the certificate in your mail program
- Importing the user certificate into:
 - Outlook: <https://tud.link/m7xx9k>
 - Thunderbird: <https://tud.link/eb25ta>
- Sets the e-mails to be signed automatically
- The digital signature is displayed for the recipient



Outlook



Thunderbird

Everybody should use the digital signature!

1. Basics – Email

- **Email**

- In Browser: <https://msx.tu-dresden.de>
- Setup instructions for email clients:
 - Outlook: <https://tud.link/k43h> for **Windows** and <https://tud.link/8gfu> for **MacOS**
 - Thunderbird: <https://tud.link/8wpk> for **Windows, MacOS, Linux, Android**
 - Apple Mail: <https://tud.link/7jpf> for **MacOS** and <https://tud.link/nhcq> for **iOS/iPadOS**
 - Gmail: <https://tud.link/15t4> for **Android**
- Please setup your signature according to your affiliation

→ Template example:

Your_title Your_name

TUD Dresden University of Technology
Faculty of Mechanical Science and Engineering
Institute of Materials Science
Chair of Materials Science and Nanotechnology

Phone: +49 (0) 351 463-XYZ
www.nano.tu-dresden.de



[1]

[1] DALL-E: <https://chat.openai.com>

2. Communication and collaboration – Video Calls and Chats

- **Zoom**

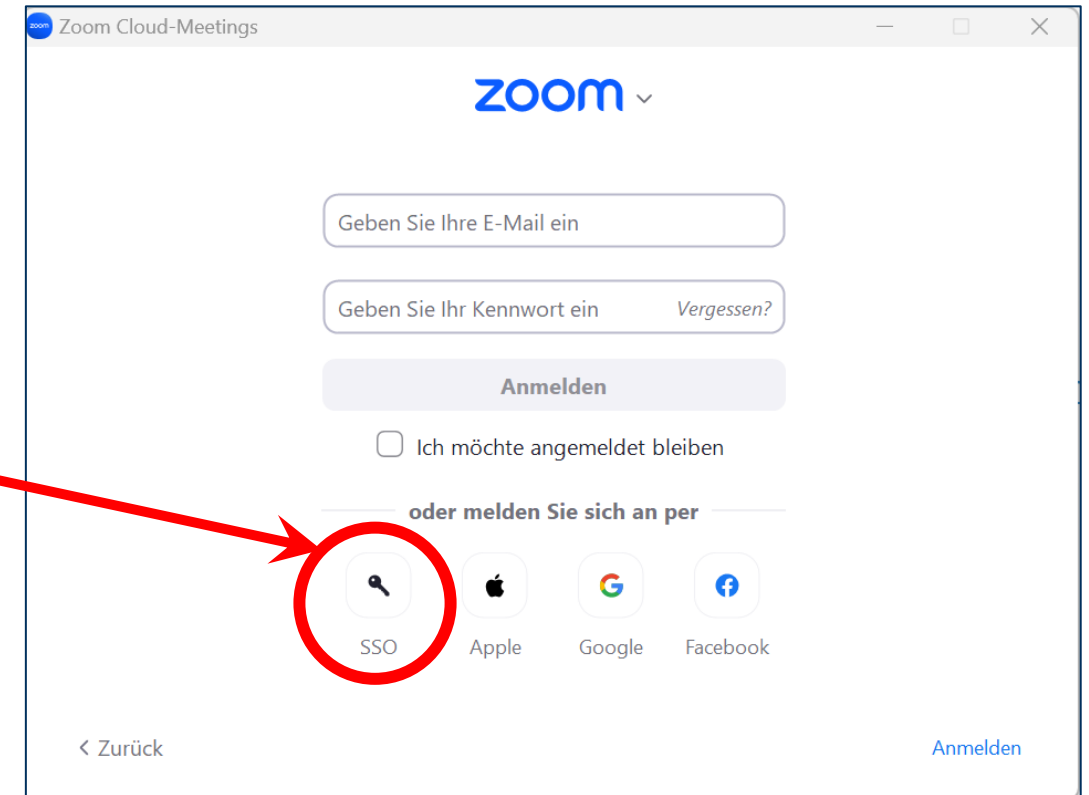
- Click „Sign in“ at <https://tu-dresden.zoom.us/>
- Create your personal link for your own Zoom room
https://tu-dresden.zoom-x.de/my/Your_Name
(Left menu on „Meetings“ → „Private room“)
- You can sign in with your ZIH-Login if you click on SSO and type *tu-dresden* in the appeared text field

- **BigBlueButton**

- <https://bbb.tu-dresden.de/>

- **Matrix-Chat**

- Chat for internal communication with students or colleagues
- Chat rooms, personal chats etc.
- <https://matrix.tu-dresden.de>



2. Communication and collaboration – Office phone → Softphone

- Check if the assignment of you phone number to your office phone is done
- <https://selfservice.tu-dresden.de/services/telephone/telephone-numbers/>

SELF-SERVICE PORTAL

My processes My tasks

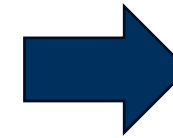
Telephone (Fixed-line telephony and mobile communications)

Service description **My phone numbers** My entries in the telephone directory Zugang zur Voicemail (VoIP) VoIP Telefoneinstellungen

Here you can view and manage your personal numbers and set the main number.
The main number is used for systems that can only work with one number.

Assign telephone number

Main number	Phone number	Actions
✓ yes	+49-351-463-31413	



Von Steffen Kampmann <steffen.kampmann@tu-dresden.de>

An servicedesk@tu-dresden.de

Betreff Beantragung Softphone mit WebEx

Absatz Variable Breite

Sehr geehrtes Service-Desk-Team,

hiermit beantrage ich die Freischaltung des Softphones.

Mit freundlichen Grüßen

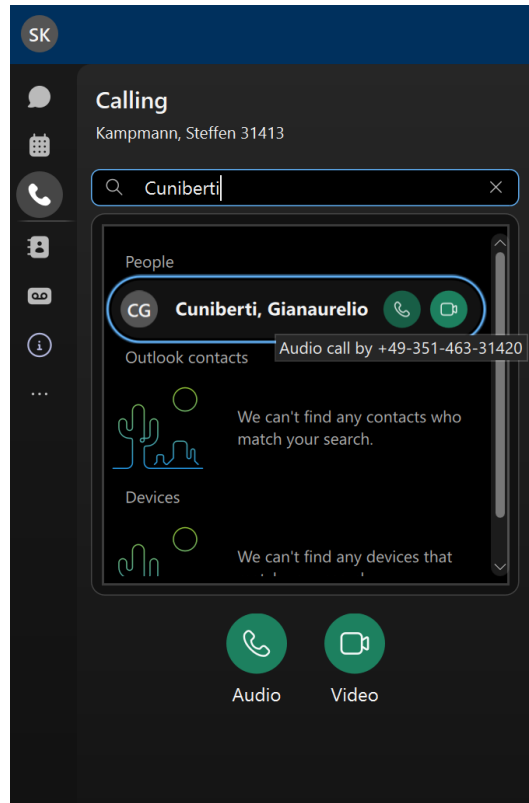
Steffen Kampmann

- Download software:
 - <https://faq.tickets.tu-dresden.de/otrs/public.pl?Action=PublicFAQZoom;ItemID=1056>
- Log in with your email address of TU Dresden
- More FAQ articles:
 - <https://tud.link/kv5vkt>

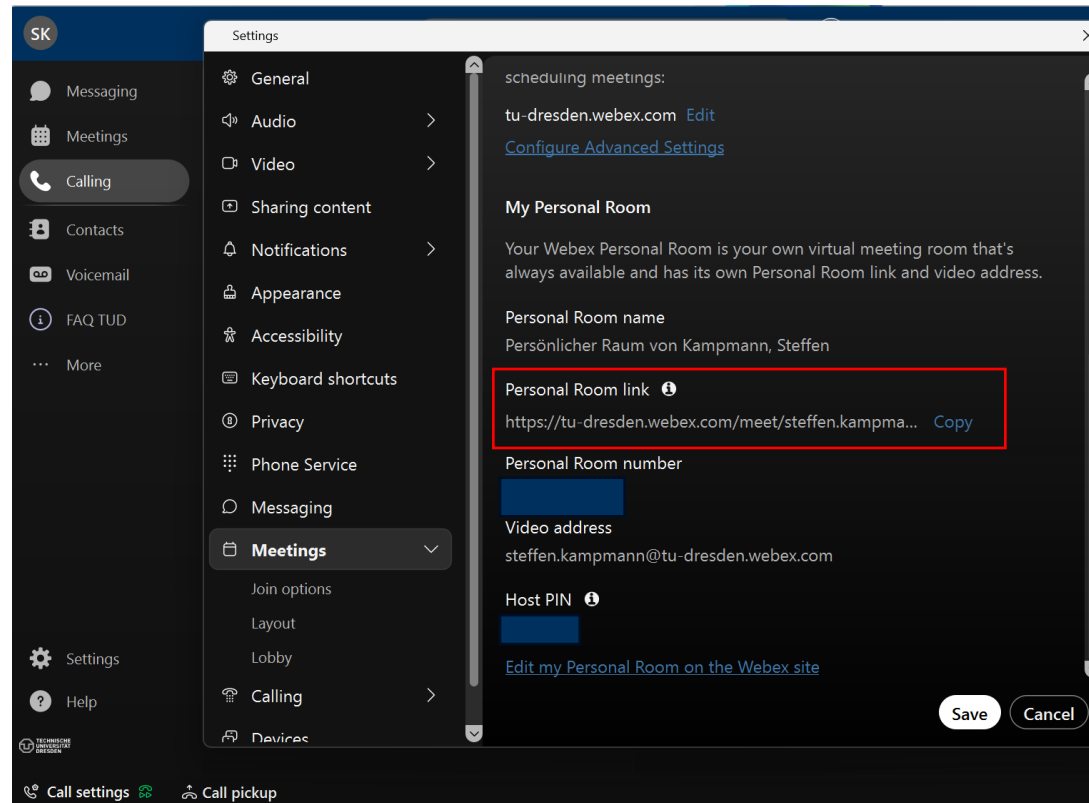


2. Communication and collaboration – Example: webex

Find persons fast:



Personal room (like in Zoom):



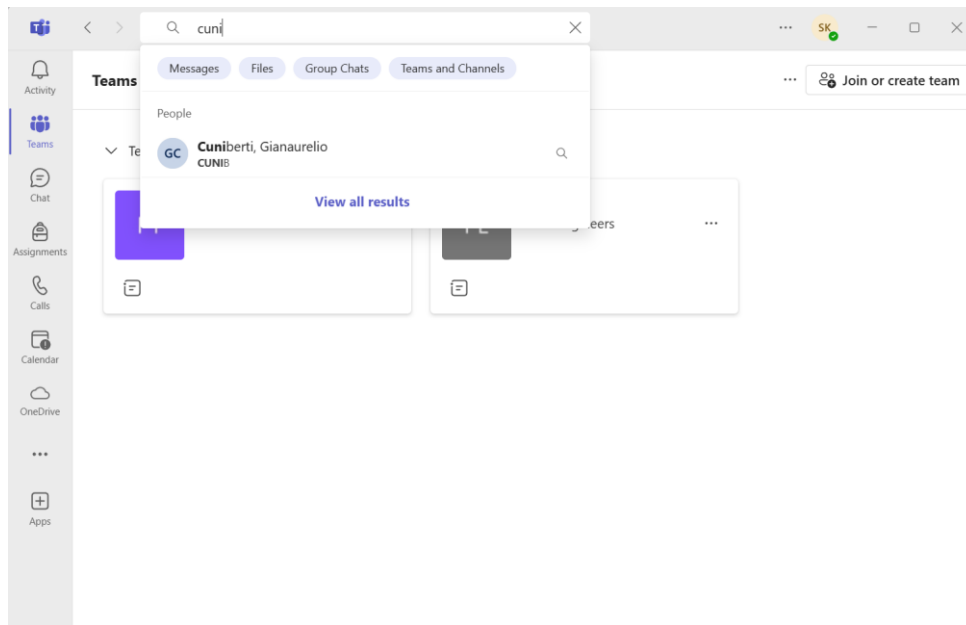
Alternative for headset:

- USB-Telephone handset



2. Communication and collaboration – Microsoft Teams

- To be able to use Microsoft Teams please visit <https://selfservice.tu-dresden.de/services/software-licenses/microsoft-365/>
- Scroll down and **activate your license**
- **Download Teams:** <https://www.microsoft.com/de-de/microsoft-teams/download-app?market=de>
- Login with your email address of TU Dresden

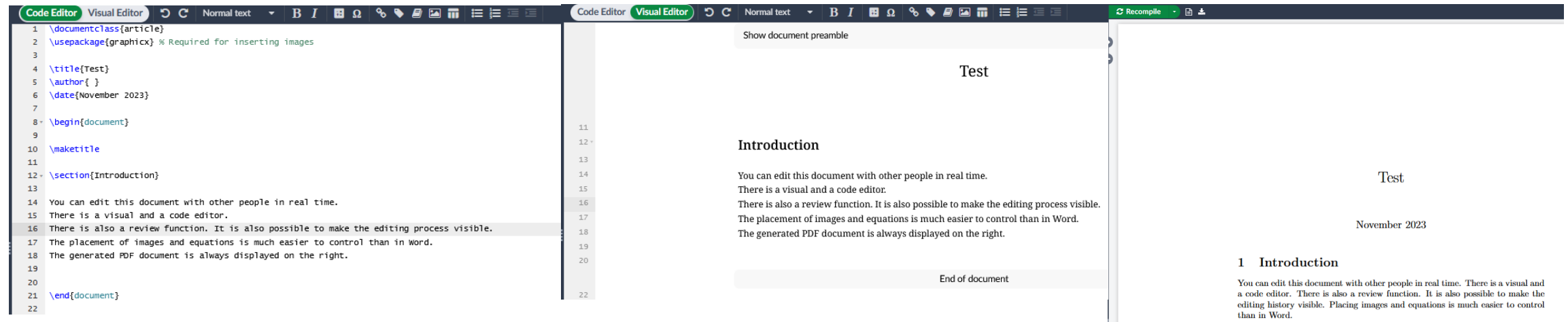
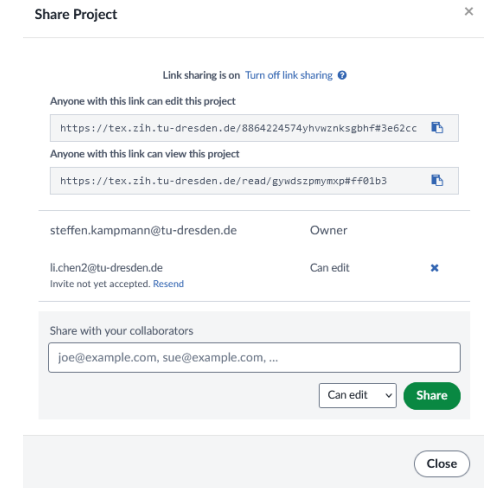


2. Communication and collaboration – Writing article

Sharepoint (Word, Powerpoint etc.):



- <https://selfservice.tu-dresden.de/services/sharepoint/>
- **ShareLatex:**
 - equivalent to Overleaf, but can be used without restrictions
 - <https://tex.zih.tu-dresden.de/>



2. Communication and collaboration – Guests at our Chair

- Create a normal guest account to have access to limited amount of IT services
 - <https://selfservice.tu-dresden.de/services/guest-login/>
- Create guest account **only** for WIFI usage:
 - <https://selfservice.tu-dresden.de/wlan/guests>

Set up guest access ×

For your guests who only need access to the wireless LAN at TU Dresden, you can set up a WLAN guest access for the **guest network VPN/WEB**. After filling out the form, the guest access will be displayed in the overview. The password for the guest access will be generated automatically.

Fields marked with * are required.

Name of guest login *

Start date *

Valid until *

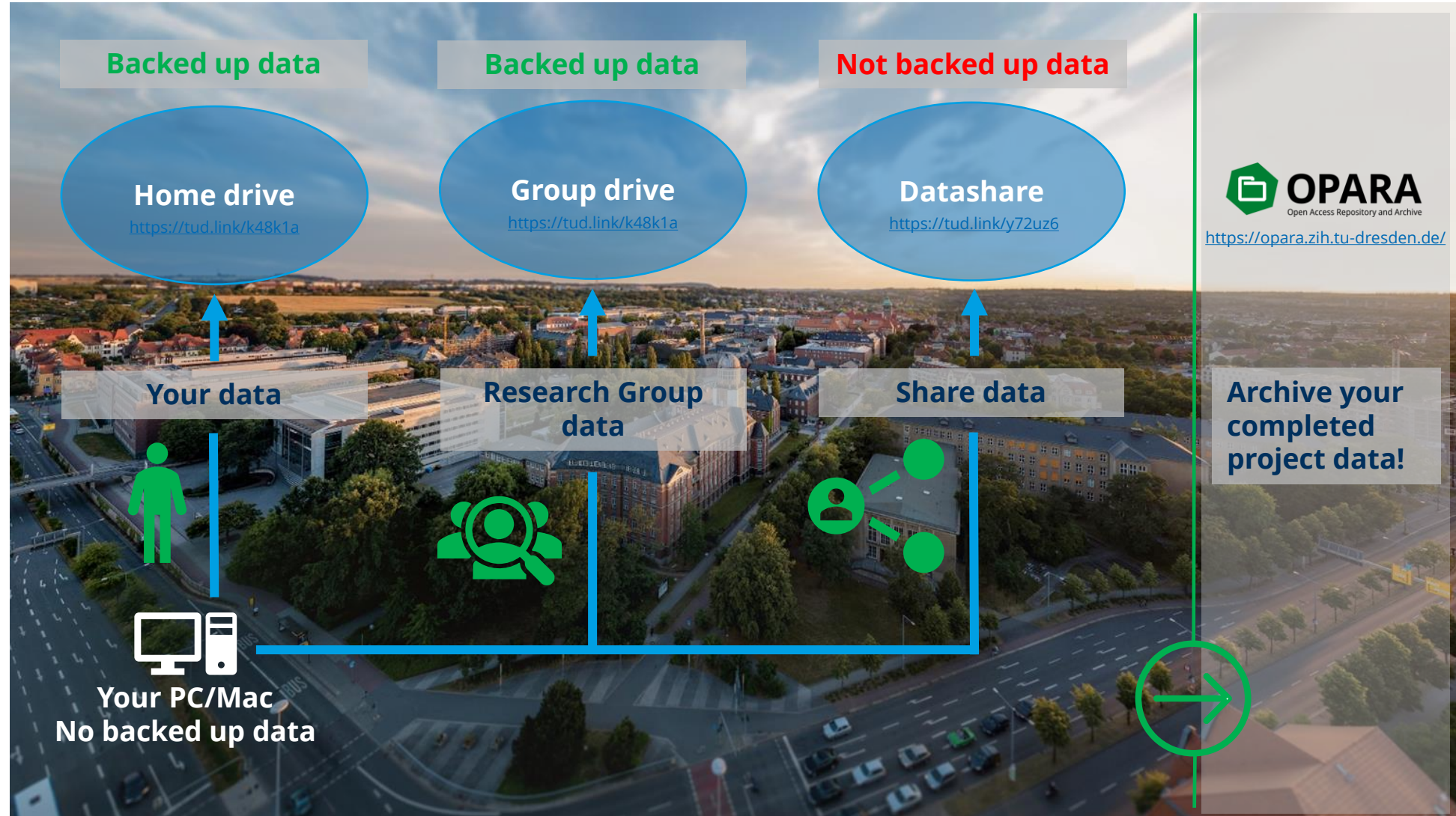
Comment

☐ Ich have read the [terms of use](#) for setting up a WLAN guest access and accept them. *

Submit

Cancel

3. Data storage – Overview



3. Data storage – Which group drives are available at the chair?

pmana (10 TB)

- Contains any chair related data
→ Win: \\vs-grp02.zih.tu-dresden.de\pmana Mac: smb://vs-grp02.zih.tu-dresden.de/pmana

pmnnano (5 TB)

- Contains project and administrative related data of Theory group
→ Win: \\vs-grp08.zih.tu-dresden.de\pmnnano Mac: smb://vs-grp08.zih.tu-dresden.de/pmnnano

pmnent (5 TB)

- Contains project and administrative related data of Environmental nanotechnology group
→ Win: \\vs-sec-smb3.zih.tu-dresden.de\pmnent Mac: smb://vs-sec-smb3.zih.tu-dresden.de/pmnent

pmnnst (5 TB)

- Contains project and administrative related data of Nanoelectronics for sensor technologies group
→ \\vs-grp08.zih.tu-dresden.de\pmnnst Mac: smb://vs-grp08.zih.tu-dresden.de/pmnnst

pmnraw (50 TB) (only Snapshots, no backup, no mirror)

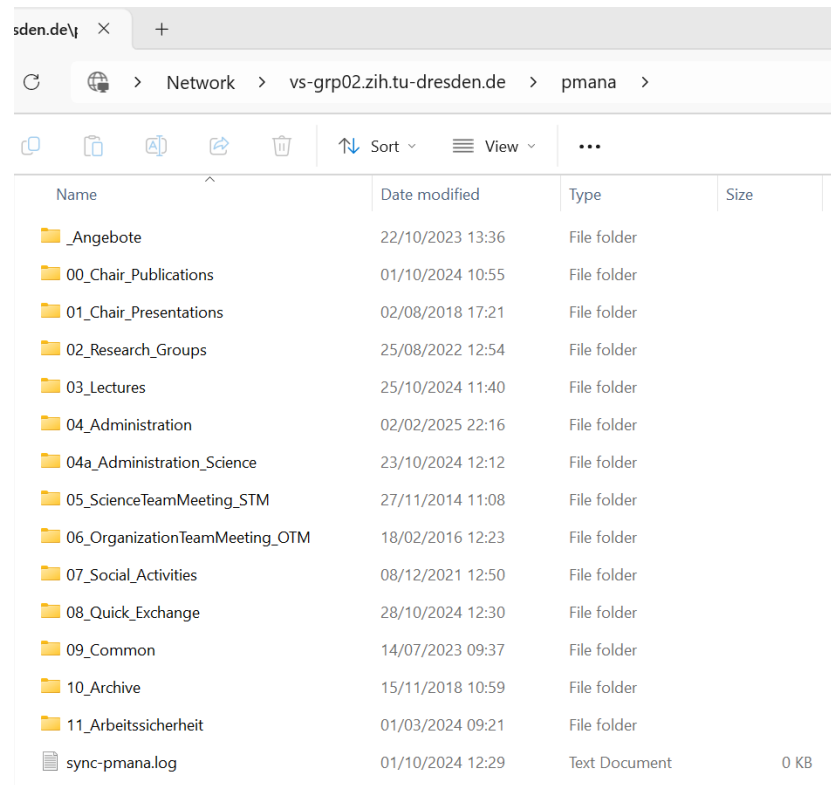
- Contains raw research data of every group
→ \\vs-grp07.zih.tu-dresden.de\pmnraw Mac: smb://vs-grp07.zih.tu-dresden.de/pmnraw

3. Data storage – Group drive: pmana

pmana (10 TB)

- Contains any chair related data
→ Win: \\vs-grp02.zih.tu-dresden.de\pmana

Mac: smb://vs-grp02.zih.tu-dresden.de/pmana



Name	Date modified	Type	Size
_Angebote	22/10/2023 13:36	File folder	
00_Chair_Publications	01/10/2024 10:55	File folder	
01_Chair_Presentations	02/08/2018 17:21	File folder	
02_Research_Groups	25/08/2022 12:54	File folder	
03_Lectures	25/10/2024 11:40	File folder	
04_Administration	02/02/2025 22:16	File folder	
04a_Administration_Science	23/10/2024 12:12	File folder	
05_ScienceTeamMeeting_STM	27/11/2014 11:08	File folder	
06_OrganizationTeamMeeting_OTM	18/02/2016 12:23	File folder	
07_Social_Activities	08/12/2021 12:50	File folder	
08_Quick_Exchange	28/10/2024 12:30	File folder	
09_Common	14/07/2023 09:37	File folder	
10_Archive	15/11/2018 10:59	File folder	
11_Arbeitssicherheit	01/03/2024 09:21	File folder	
sync-pmana.log	01/10/2024 12:29	Text Document	0 KB

3. Data storages – Share your data easily

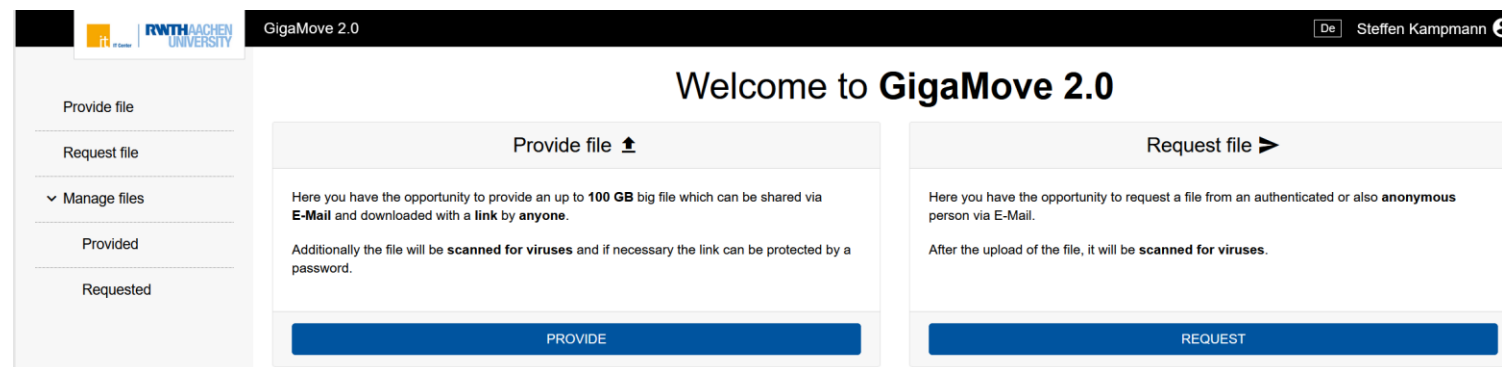
- **Datashare** based on Nextcloud environment
 - <https://datashare.tu-dresden.de/>
 - You can upload, download and share Data with internal and **external people**
 - **App** for Windows, Mac, iOS and Android
 - <https://nextcloud.com/de/install/#install-clients>
 - Installation and setup manual: <https://tud.link/fsvs>
- **Gigamove 2.0**
 - Share of large data until 100 GB (*Hint: Zip data to one file and then share it*)
 - <https://selfservice.tu-dresden.de/services/2250335/>



[1]



[3]



[2]

- [1] <https://de.wikipedia.org/>
[2] <https://gigamove.rwth-aachen.de/en>
[3] DALL-E: <https://chat.openai.com>

4. Software – Useful Tools

- **Microsoft Office**
 - Microsoft Office 365 is also available for **private** PC/Laptop (**WARNING:** No permission to use Outlook 365 for TU email account)
→ For employees: <https://tud.link/9nl1> → For students: <https://campussachsen.tu-dresden.de/>
- **Origin**
 - License of chair available (Version 2024, **also usable in VPN of TU Dresden**)
→ please contact us
 - For students **private** PC/Laptop: <https://tud.link/h928>
- **Matlab**
 - For students and employees **office/private** PC/laptop
 - <https://de.mathworks.com/academia/tah-portal/tu-dresden-40758619.html>
- **Solidworks**
 - License of chair available → please contact us
- **Sophos**
 - Anti Virus for **private** Laptop → <https://home.sophos.com/en-us/employee>
- **Alternatives for Adobe Products:** <https://tud.link/pmx21m> (Affinity Designer), <https://tud.link/7u6kbt> (PDF Studio Pro), <https://tud.link/jrqhvw> CorelDRAW Technical Suite



Full software list: <https://tud.link/xn1o>

4. Software – Be Careful

Please do not use

- **External cloud services** like:
Dropbox, iCloud, Google Drive, OneDrive etc.
→ **Do not** save your research data here
- Software with illegal license
- Software from Kaspersky Lab

Please use following services of TU Dresden

- **Home and Group drives**
→ **Save your research data here**
- Software list of TU Dresden or ask colleagues for alternatives
- Sophos (already installed)

Please only install software from trustworthy sources
E. g. for open source software: <https://www.heise.de/download/>

5. Workstations and Server – Powerful Hardware

- Run your calculations on specialized Hardware that is available 24/7
- Remote workstations for computing
 - <https://selfservice.tu-dresden.de/services/research-cloud/>
 - Preinstalled (Ubuntu, Windows ...)
 - Easy installation of software
 - No waiting times
- High Performance Computing (HPC)
 - <https://doc.zih.tu-dresden.de/>
 - To get access please contact **Dr. Rafael Gutierrez** (rafael.gutierrez@tu-dresden.de)
 - **Third largest GPU cluster in Germany**



[1]



[2]

[1] DALL-E: <https://chat.openai.com>

[2] <https://tu-dresden.de/>

5. Workstations and Server – First Steps

- **Remote PC (Windows) hosted by TU Dresden**

- <https://rds.zih.tu-dresden.de/>
- As student **choose** “Office Collection”
- Many preinstalled software like Origin, COMSOL Multiphysics, Microsoft Office, Python, SPSS, Maple etc.
- Your home drive is already mounted
- You have access to your data on your local PC too

- **Control your office or lab PC remotely**

- You can control your **office or lab PC** from everywhere
- <https://rsupport.zih.tu-dresden.de/users/main/downloads.html>
- You can find a simple manual in following document
<https://nano.tu-dresden.de/shared/16>



[1] <https://lb.islonline.com/>

6. Security and Network – Scam Emails

Available?



Gianaurelio Cuniberti <profmail88@mail.ru>
An Kampmann, Steffen

Let me know if you are free right now.

BR
Gianaurelio Cuniberti

Do you have some minutes?



Prof. Dr. Gianaurelio Cuniberti <deanprof2@mail.com>
An

Hello.
I need a quick response from you, Kindly email me back as soon as possible.

Regards,
Prof. Dr. Gianaurelio Cuniberti
Head of Department

Have you got some free time?



Gianaurelio (Giovanni) Cuniberti <maaike.bader@mail.ru>
An Kampmann, Steffen

Email me back as soon as you get this. Thank you.

Prof. Dr. Gianaurelio Cuniberti <deanprof3@mail.ru>
Sa 29.07.2023 18:32

An:

Aktionselemente

I really appreciate your response, I urgently need your help to purchase some Apple iTunes Gift cards from any store around you. There are some prospects I need to send Gift items but I can't do that right now because I'm currently attending to a friend at hospital who is critically sick. Please let me know if it's possible to get them right now, so I can tell you what amount I'll need, I will surely reimburse you.

Regards

You will NEVER be asked for your password or for money and vouchers

Report Scam email to TU Dresden (ZIH)

- <https://tud.link/35d7>

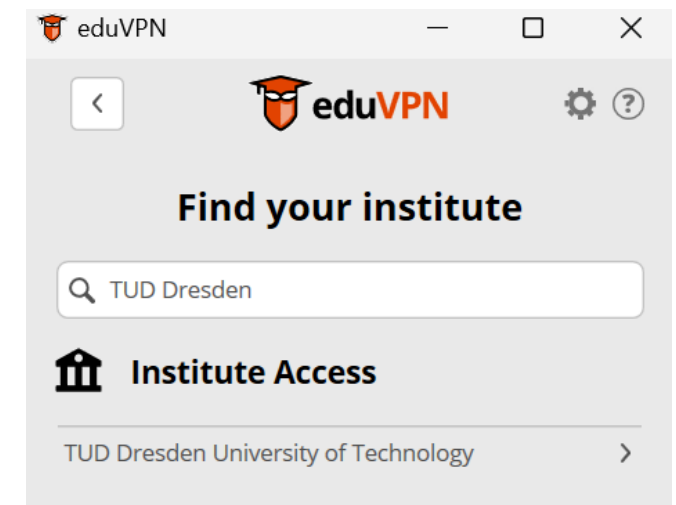
6. Security and Network – Stay connected with TU Dresden

- To have full access to all **services** stay in the TU network with VPN
 - **Secured connection in public Wi-Fi networks** e. g. on conferences
 - Required for accessing the home and group drives



New VPN software

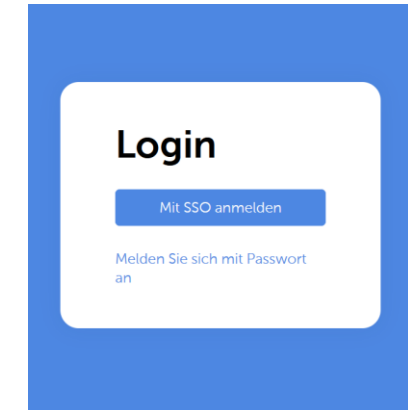
- **Install eduVPN software**
 - <https://www.eduvpn.org/client-apps/>
- **Search** for TUD Dresden... and select **TUD Dresden University of Technology**
 - **Done!**
- **Please note:** Support for OpenVPN and Cisco AnyConnect will **end** during this year



You can install eduVPN on your personal and business laptop/PC and on your smartphone

6. Security and Network – Password Management

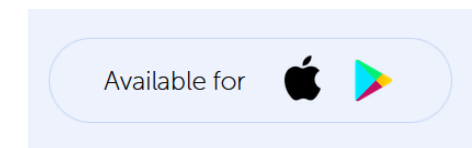
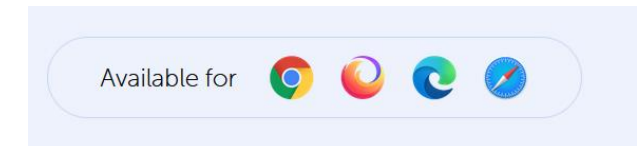
1. Visit: <https://passwords.tu-dresden.de/>
2. Login with your ZIH credentials
3. Setup a Master password for you private password tresors
4. Your account will be activated within a day
5. You are ready!



6. If you have access to the chair's accounts, you will be added to a corresponding password vault

7. Install the **Passwork** App on your **device** or **browser**

- **Note:** You can also add two-factor authentication to the stored passwords



This prevents passwords from being lost

6. Security and Network – Password - Example

- Use Browser Plugin “Password self-hosted”
- After installation the plugin ask you for Host URL → **passwords.tu-dresden.de**
- Passwords and 2FA-Authentication

The image shows two screenshots related to authentication at TU Dresden. On the left is a web browser view of the 'TU Dresden DFN-AAI-Login' page. It includes a warning about the connection, a description of the 'Self-Service-Portal der TU Dresden', and a section for entering a one-time password (TOTP) with 'Starte Tokenverfahren neu' and 'Überprüfen' buttons. On the right is a mobile app interface for 'ZIH Login', showing fields for Login, Password, and TOTP 1, with a 'Webversion öffnen' link and a bottom navigation bar.

This prevents passwords from being lost

Thank you for your attention!