



# **Campus App for Android**

# Manual

Android-Praktikum  
Sommersemester 2012  
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Wintersemester 2011/12  
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## 1. General

The TUM campus app was developed as part of the Android internship at TU Munich in the summer semester 2011, where it was programmed by Christoph Richter and Thomas Bley. In the in the Android internship winter semester of 2011 Vincenz Doelle, Daniel G. Mayr and Thomas Behrens fundamentally extended some functions. After version one and two were developed simultaneously. Florian Schulz and Vasyl Malinskyi, with help from Thomas Bley, take mission to unite these two versions that in the new versions of the app includes all developed features. This is not an official app of the Technical University of Munich. Therefore, the Technical University of Munich does not assume any support or guarantee.

The app contains the most required information, for students, in a clear format. This includes meal plans, schedules of public transportation for MVV, events, news, gallery, Facebook and reference links. Moreover, it is in the app store different services that you know of TUMonline perform. This includes the lecture search, the display of your courses, a roomfinder, a people search and grades information. Additionally, prints such as the registration certificate can be accessed. Also the tuition fee status or plans of study are shown.

More information for TUMCampus App:

<http://www.facebook.com/pages/TUM-Campus-App-für-Android/162327853831856>

The app collects personal information only when the user enters this explicitly, or manually via the SD card imported. The application does not transmit any personal information and statistics to third parties.

All data of the application can be deleted as follows: main screen of your smartphone → Menu button → "Manage applications" tab → press "Downloaded" button → "TUMCampus" → Click "Clear data". The project is open source. The source code can be downloaded from <https://github.com/vasylja/new-campus-app>.

## 2. First Start

Before you click on the button „ Start: First time data download“, we recommend you to set up your TUMonline access ID and your token. This is because, as some data can only be imported with these identifiers. If you don't do this, you have to click several times.

### 2.1. TUMonline Settings

After launching the app, slide the slider in the main menu "Data and settings" to the top. By clicking on the menu item "TUMOnline settings" takes you to a selection box where you can specify the individual data.

1. Under LRZ identifier button enter your LRZ identifier followed by „@mytum.de“. E.g. "no42bug@mytum.de"

2. Under TUMOnline password please enter your password, which you use for TUMOnline.

3. Have you ever unlocked an access token, you can enter it below TUMonline access token. If not, go to "generate access token" at the top of the box, then login in TUMonline on your Computer. Go under "token release" to activate the token and put the rights you want for the token. (For this step, a working Internet connection to the device is required)

## 2.2. **Initial download**

If you have set the settings TUMonline (2.1), you can start with the initial download. Click the button on main menu at the top titled "Start: First time data download ". Make sure that your device has an internet connection and press this button. The TUM campus app will now provide data. For more information, see "3 Update"

*Please note: The button is only displayed if the device has an internet connection.*

## 3. **Update**

To keep the app up to date, you should update it regularly.

Press in the main menu of the app on the button, which is labeled according to the connectivity to "Update (WIFI)", "Update (HSDPA)" or "Refresh (EDGE)". The app will update its data on the specified connection status.

Star menu will show you, in which sub-menu there is new data.

Once they have updated the data, they have even without a data connection to access different features of the app. Those are actually all. Except the people search, the search lecture, the roomfinder, MVV departure schedules, curricula and student fee status.

Es ist auch möglich, nur einzelne Unterpunkte (z.B. Speisepläne) zu aktualisieren. Rufen Sie dafür den entsprechenden Unterpunkt auf, drücken Sie die Menü-Taste ihres Smartphones und drücken sie auf „Aktualisieren“. Um alle heruntergeladenen Daten wieder zu löschen, drücken sie im Hauptmenü auf die Menü-Taste ihres Smartphones und anschließend auf „Cache leeren“.

It is also possible to update individual sub-items (e.g. menus). Call for the appropriate sub-item, press the Menu button and press it to their smartphones on "Update". To delete all the downloaded data again, press the main menu, press the Menu button on your smartphone and then "Empty cache."

*Please note:*

*If no network connection is available, no Update button is displayed. Downloading data using HSDPA or EDGE, depending on your network provider and contract, causing costs.*

## 4. **Lectures**

### 4.1. **Import Lectures**

The TUM campus app allows to display lectures. You have two choices to import the lectures from TUMonline. The difficult way, with a computer and the easy and fast way through the mobile device.

#### 4.1.1. **Direct Import**

To import directly through the smartphone, go this way:

1. Start TUMCampusApp
2. Slide the slider in main menu „Data and settings“ to the top
3. Press Button „Import lectures from TUMOnline“

#### 4.1.2. **Import with help of a Computer**

To import directly through the computer, go this way:

1. Login in TUMOnline
2. Click in TUMonline on the button „Lecture-registration/cancelation“
3. Click on „Place/Time“
4. Click on „CSV-Export“
5. Click on „Download“
6. Edit the downloaded file possibly with Excel
7. Connect your Smartphone with the USB-databable to your PC
8. Activate the USB-mode of your Smartphones
9. Save the CSV-File under <SD-Card>\tumcampus\lectures
10. Disconnect your Smartphone
11. Start TUM-Campus App
12. Move the Slider (in main menu) „Data and settings“ to the top
13. Press Button „Import lectures form SD-card“

### 4.2. ***More informations for the lectures***

#### 4.2.1. **Find Lectures**

If you drag the slider you will see an entry „Find Lectures“. Through its selection appears a search box, where the name of the course can be entered. The search takes place, as well as implemented in TUMonline. It finds incomplete and complete lecture titles. Clicking on a found lecture will show you all the available details, including semester, type, hours, start (first date), contributors, content, method, goals and resources. At the top is the "lecture dates" also a link to the registered in TUMonline Schedules for this course. Here you can see the color of the events, whether the relevant date in the future or the past is (blue or black).

#### 4.2.2. **Show My Lectures**

If you drag the slider you will see an entry „My Lectures“. This leads you to an overview for all registered Lectures through. The courses are sorted by date. The most recent

appear on top. If you want to search for a lecture that you have visited in a particular semester, you only have to press the top selection box and choose your semester. Clicking on a lecture will show you all the available details, including semester, type, hours, start (first date), contributors, content, method, goals and resources. At the top is the "lecture dates" also a link to the registered in TUMonline Schedules for this course. Here you can see the color of the events, whether the relevant date in the future or the past is (blue or black).

#### 4.2.3. **Drehscheibe**

Press on a lecture in your LecturesList (lower half of the screen). Then press on the number on the right top (e.g. IN2119), to get further information about your lecture, if there is something deposited at [drehscheibe.in.tum.de](http://drehscheibe.in.tum.de).

#### 4.2.4. **TUMonline**

To search for more information about a lecture in TUMonline, select the course and press on one of the dates.

#### 4.2.5. **Holidays and Vacation**

In addition to the lectures, you can display holidays and vacations.

#### 4.2.6. **Delete entries**

Alternatively, you can delete entire classes or individual appointments.

To delete a course, you press and hold on the lecture (bottom half) and then confirm it with "Yes".

To delete a single appointment, select the specific date of (top half), long press on it and confirm their decision, "Yes."

#### 4.2.7. **Smartphone silent during lectures**

The TUM campus app can turn your smartphone automatically muted during the lecture. For incoming calls, you will hear no sound. This feature is enabled by default.

To enable or disable it, press the main menu of the app menu button (4 strips to each other) of their Android device to access the settings. There you will find the option of automatic her "Phone automatic. silent "Enable or disable the function by pressing on it. Pressing the Back button of your device will bring you back to the main menu.

### 5. **Person Search**

The People Search allows you to search for specific individuals who are employed by the Technical University of Munich as a professor or researcher or otherwise have an account TUMonline e.g. Students. In the top search box, enter the name or names of the person and click on "enter". It is advisable here to enter the full name, as in the database of the University of Surprisingly Many People are and therefore the information retrieval due to the relatively slow disposal interface may take longer. Therefore, it is important to know that you can stop the search by clicking on the "Back" button or "Search" e.g. to enter the name of a closer and shortening the charging time.

### 6. **Grades**

Click on Grades in main menu.

All grades are displayed, you have been reached, or which are included in your TUMonline account.

Clicking on "All programs" and the top button, you can choose to what degree the grades are displayed. The displayed number is the number that appears in TUMonline to a course if there are several programs available. Otherwise, there is no need to select the program.

## 7. Documents

Press the main menu, click Documents. Here you will find a collection of documents that you can download onto your device. The documents are similar to those that are found in TUMonline in the category for "printouts for students." Clicking on a particular point is still in demand in a popup if you want to reload the document, or opening from SD card, if you have looked at the document and not only want to generate as much traffic. The Android device is opening the documents (PDF files) for the PDF files by default application set. If you have not installed a program, try Adobe Reader (<https://market.android.com/details?id=com.adobe.reader>).

## 8. Study Plans

Press the main menu button Study Plans. This function provides you with various plans offered at the computer science department. Do you want to get displayed a different study plan, click "choose study plan" at the bottom.

## 9. Tuition Fees

Press the main menu button Tuition Fees. You are now in a process known from TUMonline range, which indicates whether a tuition fee is still due, or whether the university has received the amount already.

## 10. Cafeterias

### 10.1. *Choose Cafeteria*

Press the main menu button Cafeterias. You will now see a list of the dining halls. Choose from one of the dining halls, press on the desired entry.

### 10.2. *Mensa filter*

If you only certain places (e.g. only in Garching) want to have in your selection; you can use the canteen filter. Press the main menu, and in the overview of the Cafeterias on the Menu button on your smartphones and then click Settings. Press Mensa filter. Now enter e.g. "Garching" and confirm your entry with "OK". Use the Back button of your device to return to the app. Now only canteens and cafeterias in Garching are displayed. To remove the filter, use the same procedure; enter in the box but no text.

### 10.3. *Choose date*

The menu is displayed for the current day or the next working day at weekends. To see the menus next few days, you have to select a different date. Pull the "choose date" for the slider with the label side up, and then select the desired date by pressing on it.



#### 10.4. ***Prices and Opening Hours***

To get information about the prices of food and the opening hours of the dining halls, press the menu button on your smartphone. You will now see the option "prices". This is a link to the relevant websites of the student union. You can access it by pressing on the button.

### 11. **MVV**

The TUM campus app can display the current departure times of MVV. Please note: The times are directly downloaded from the Internet. Therefore, an Internet connection for this feature is necessary. Depending on the service provider contract costs can arise. For the current departure times are unfortunately not all stops are available. (see test operation under <http://www.mvg-live.de>)

#### 11.1. ***Choose station***

Press the main menu MVV. If their desired station is already stored, you can select it by pressing on the name of the stop. Then the next departure times are displayed. You cannot find your desired station? Enter through "search station" the name of the station to add it.

#### 11.2. ***Delete Station***

To remove a station from the list of preset stations, press and hold on the name of the station. Confirm the deletion of the stop with "Yes".

#### 11.3. ***Station Timetable***

If you have the display of current timetables addition want a timetable press Menu in the MVV the Menu button on their smartphones. Now press "MVV EFA" to open her internet browser the schedule information of MVV. Optionally, you can place the app and the mobile website MVG use Live for departure times, press on "MVG Live" in the MVV menu.

#### 11.4. ***MVG Disorder Sticker***

MVG disorder sticker is integrated as an RSS feed in the TUM campus app. It can be invoked in the RSS feeds, see "12. RSS Feeds".

### 12. **RSS-Feeds**

#### 12.1. ***Change between Feeds***

To switch between two different feeds "Select Feed" to move the slider up and press the desired Feed.

#### 12.2. ***Add Feeds***

##### 12.2.1. **Add Feeds on Smartphone**

The easiest way to add feeds to the list, is to enter the name and URL at the lower end of the menu to the RSS feeds and press "Add". It does not have to be the exact URL of the feed given. It is sufficient, to enter "heise.de" to get the thread of Heisenberg.

##### 12.2.2. **Import Feeds**

Alternatively, for direct entry is possible to import RSS feeds. To do this, please proceed

as follows (description for Windows operating systems, running on other operating systems, it is similar):

1. Connect your device to your Computer
2. Activate the USB-Mode of your device
3. Open the RSS-URL or a normal news site (with RSS-function) in your browser
4. Open with your Windows Explorer the directory <SD-Card>\tumcampus\rss of your device
5. Pull the RSS-URL from your address-field of your browser in the open directory.
6. Disconnect your device from your Computer
7. Start TUMCampusApp
8. Slide the Slider in main menu "Data and settings" to the top
9. Press the button „Import RSS-Feeds“

### 12.2.3. Remove Feeds

To remove a feed from the list, press and hold on the name of the feed and confirm the deletion by clicking "Yes".

## 13. Events

The TUM Campus app provides an overview of various upcoming and past events at TU Munich. The events are listed chronologically, with the next event on top. Press the main menu events. To learn more about an event, press it. It will open a detail window. Pressing the Back button to return to their smartphone the list of events. In order to view past events, drag the slider in the event menu "Past Events" to the top. Drag it back down to see the upcoming events.

## 14. Area Maps

A click on the main menu area maps opens an overview of different campus of the Technical University of Munich and a few MVV network plans. A click e.g. a campus environment the plan of Camus opens the picture. Zoom is possible.

Neighborhood plans are intended to quickly get an overview of a particular area. If students are new to Munich and there is still a lack the overview, these functions can be used to quickly view a specific plan.

## 15. Roomfinder

The roomfinder can be found on the menu item. The system works with the one numbered space, but also with names such as classroom e.g. "Carl von Linde Hörsaal". It is already the auditoriums of substrings as in the previous example with "Carl".

For this intent, the app TUM room finder is used. Please note: it has to be the version 1.2 or greater.

## 16. **Opening Hours**

In opening times are different opening times at various libraries, cafeterias and other institutions.

By a click on "Select Category", you can choose from which institution you want to get information and opening times. In the "Information" tab other opening times, especially for the area of computer science has been collected.

## 17. **News**

The TUM campus app displays the latest news. Press the main menu, go to news to the news menu and display the news.

## 18. **Links**

The TUM campus app offers with the Link menu a quick access to important websites related to studying. By default, this includes, e.g. jobs or job center of the Technical University of Munich and the online library catalogs of the Technical University of Munich and the Ludwig-Maximilian University of Munich (TUM OPAC OPAC or LMU). More links can be added to any existing and may be deleted.

### 18.1. ***Add Links***

#### 18.1.1. **Add Links through input**

The easiest way to add links to the list, it's at the bottom of the left menu to enter the desired name and URL links and press the "Add".

#### 18.1.2. **Import Links**

Alternative to the direct input, there is the ability to import links. To do this, please proceed as follows (description for Windows operating systems, running on other operating systems, it is similar):

1. Connect your device to your computer
2. Activate USB-Mode on your device
3. Open URL in browser
4. Open directory <SD-Karte>\tumcampus\links in Windows Explorer on your device
5. Pull the URL from your address-field of your browser in the open directory.
6. Disconnect your device
7. Start TUMCampusApp
8. Slide the Slider in main menu "Data and settings" to the top
9. Press the button „Import links“

### 18.2. ***Delete Links from List***

To remove a link from the list, press and hold on the name of the link and confirm the deletion by clicking "Yes".

## 19. **Gallery**

Gallery is a connection to Facebook-Gallery and shows the latest posters from the computer science faculty. There is also an Archive if you move the slider to the top. The update function is working with the menu button.

## 20. **Facebook**

This is button, which leads to the mobile page of facebook and the TUMCampus Facebook page.

## 21. **Module**

Modules are the list points on the home screen. You can activate them through the settings using the menu button.

## 22. **Exception Handler**

The Exception Handler is used to improve the app. He sends the Report\_ID, the FilePath, the DeviceModel, the Android Version, the StackTrace and a user comment to the developers. To send this Report, you have to move the Slider from up to down and click on the exclamation mark and send the report.

## 23. **Hints for developers**

The TUMCampusApp is an open source project. The source code is under the licence of „GNU GPL v3“ and is located under <https://github.com/vasylja/new-campus-app/>.

There is a debug mode. To activate the debug mode, you have to press the menu button in the main menu, go to settings and click on Debug Mode. Then an additionally button named “Debug” appears. Within this menu you can view the content of the database. There were also complete Java-Stacktraces during the downloading of data, if an error occurs.