VS Code
Working remotely on the USM systems (still)

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1 Extensions

Similar to Atom VS Code is modular and can be extended. These extensions can be install via the internal marketplace.
I will again give a short overview of some useful packages.

1.1 Remote - SSH

This starts a full remote instance of VS Code on the server. That makes it more stable and allows to use all features of VS Code on the remote machine.
You can daisy chain servers by defining a jump-host between the target host (which is not visible to the outside world) and the user pc.
Info:
`https://code.visualstudio.com/docs/remote/ssh`
`https://code.visualstudio.com/blogs/2019/10/03/remote-ssh-tips-and-tricks`

Caution: On Windows you need to patch your SSH install for this to work!
See: `https://github.com/microsoft/vscode-remote-release/issues/18`

Example Config to run on USM machines:

```
# this host can be directly accessed from the outside
Host <jump_host>
  HostName <jump_host>.usm.uni-muenchen.de
  User <user>
  ForwardX11 yes


# this host is behind a firewall and can only be accessed through <jump_host>
Host <target_host>
  HostName <target_host>.usm.uni-muenchen.de
  User <user>
  ForwardX11Trusted yes
  AddressFamily inet
  ProxyJump <jump_host>
```

1.2 Project Manager

Save frequently used folders on local or remote machines. Provides quick access functionality. `https://marketplace.visualstudio.com/items?itemName=alefragnani.project-manager`

Example for setting up a direct path to your usm home directory:

```
[
{
"name": "USM",
"rootPath": "vscode-remote://ssh-remote+usm/<path_to_your_home>",
"paths": [],
"group": "remote",
"enabled": true
}
]
```

This uses a host set up with Remote-SSH:

```
Host usm
  HostName ltsp01.usm.uni-muenchen.de
  User <user>
  ForwardX11 yes
```

1.3 Git integration

Allows to execute git commands within VS Code. The design and especially the representation of git diff is slightly better, in my opinion.
Contains GitLens. `https://marketplace.visualstudio.com/items?itemName=eamodio.gitlens`.

1.4 Python

Native suport for Python execution, as well as Jupter notebooks.

1.5 vscode-pdf

Open PDF files in VSCode. `https://marketplace.visualstudio.com/items?itemName=tomoki1207.pdf`

1.6 Better Comments

Colored comments with color by type of comment. `https://marketplace.visualstudio.com/items?itemName=aaron-bond.better-comments`

1.7 Live Share

Allows you to share your editor instance with another user. Similar to the Atom package you share a link and invite someone into your editor instance.
Shares your current workspace and everyone invited can access files. So be aware of that.

1.8 VIM

vim functionality and shortcuts. `https://marketplace.visualstudio.com/items?itemName=vscodevim.vim`

1.9 Todo Tree

Stores direct references to To Doß in your code files.

1.10 LaTeX Workshop

Works the same as in Atom. Builds the project on save.
VERY good autocomplete and other cool functionality: shows equation and figure preview on mouse hover.

1.11 Themes

VS Code can be customized and you can change appearance and syntax highlightling themes.

For the UI a popular package seems to be Peacock: `https://marketplace.visualstudio.com/items?itemName=johnpapa.vscode-peacock`

You can install e.g. the Atom syntax theme: `https://marketplace.visualstudio.com/items?itemName=zhuangtongfa.Material-theme`