

# Markdown to Jupyter notebook example

---

Here is a SugarTeX example with eq. 1 and fig. 1.

See [PDF of this source](#) if you do not have [excellent Unicode support](#).

$$\begin{aligned} \nabla \times \mathbf{B} - \frac{1}{c} \frac{\partial \mathbf{E}}{\partial t} &= \frac{4\pi}{c} \mathbf{j} \\ \nabla \cdot \mathbf{E} &= 4\pi \rho \\ \nabla \times \mathbf{E} + \frac{1}{c} \frac{\partial \mathbf{B}}{\partial t} &= 0 \\ \nabla \cdot \mathbf{B} &= 0 \end{aligned}, \quad (1)$$

where  $\mathbf{B}, \mathbf{E}, \mathbf{j} : \mathbb{R}^4 \rightarrow \mathbb{R}^3$  – vector functions of the form  $(t, x, y, z) \mapsto \mathbf{f}(t, x, y, z)$ ,  $\mathbf{f} = (f_x, f_y, f_z)$ .

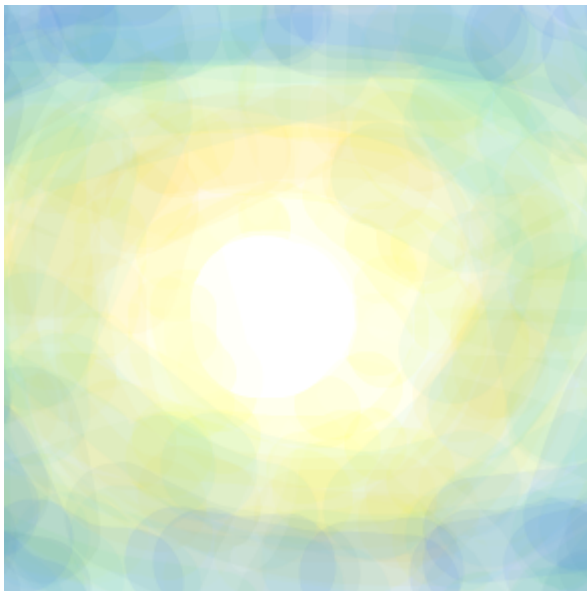


Figure 1: Sample image with cross-references.

In this version of Pandoc image caption fig. 1 works.

```
from IPython.display import Markdown
import pandas as pd
import numpy as np
import tabulatehelper as th

df = pd.DataFrame(np.random.random(16).reshape(4, 4))

Markdown(f'''
{th.md_table(df)}
: Table {{#tbl:table1}}
''')
```

Table 1: Table

0	1	2	3
0.347104	0.932652	0.416832	0.608414
0.499972	0.339335	0.014886	0.0262858
0.508947	0.227758	0.446236	0.719912
0.310665	0.11572	0.251788	0.225939

Text and tbl. 1

```
import pandas as pd
import numpy as np

df = pd.DataFrame(np.random.random(16).reshape(4, 4))

df
```

```
# R cell:  
x <- c(10, 20)  
x[1]
```

10

## Header

---

```
x <- c(10, 20)  
x[1]
```

10

```
import math  
Markdown(f'''  
Markdown text with SugarTeX formula:  $\alpha^{\{math.pi:1.3f\}}$ $.  
It works because of the Markdown display option and  
SugarTeX Pandoc filter.  
''')
```

Markdown text with SugarTeX formula:  $\alpha^{3.142}$ . It works because of the  
Markdown display option and SugarTeX Pandoc filter.

```
print('Hello!')
```