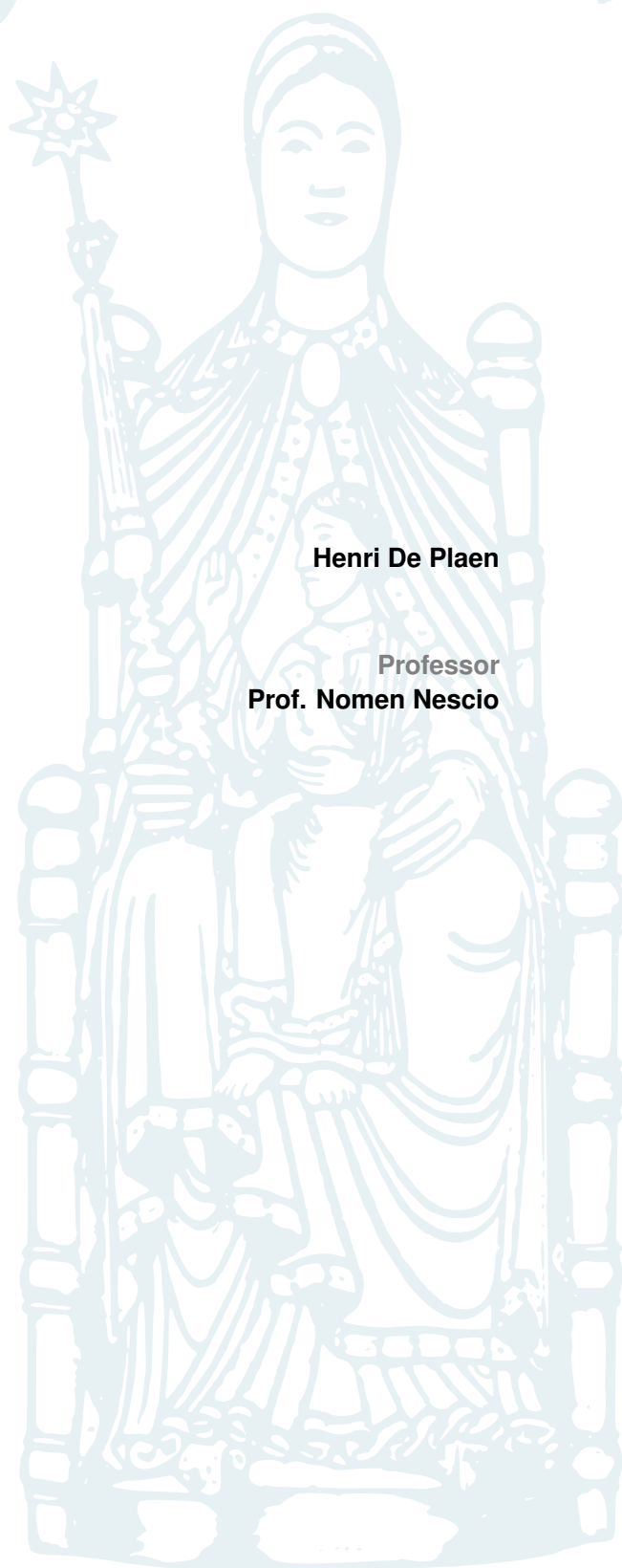# The KULTEM Style

Example and Short Manual

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CHAPTER **1**

Example

> **Note:** This is a nice box where you can put a lot of information concerning the following chapter. How much pages are required for an assignment for example, or an important change of notation.

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1.1 SOME QUESTIONS

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As an example, we will consider the equation of the Duffing oscillator

$$\ddot{x} + k\dot{x} + x^3 = B\cos t, \tag{1.1}$$

with $k = 0.1$ and $B = 11$ and answer the following questions

1. Can you show that the model exhibits a chaotic regime?

    i. By performing a qualitative analysis of a simulation?

    ii. By computing the Lyapunov exponents of the system?

2. What is the dimension of the system?

3. Simulate the model for another choice of parameters. What do you observe?

1.2 A WILD FIGURE APPEARS!

Nulla malesuada porttitor diam. Donec felis erat, congue non, volutpat at, tincidunt tristique, libero. Vivamus viverra fermentum felis. Donec nonummy pellentesque ante. Phasellus adipiscing semper elit. Proin fermentum massa ac quam. Sed diam turpis, molestie vitae, placerat a, molestie nec, leo. Maecenas lacinia. Nam ipsum ligula, eleifend at, accumsan nec, suscipit a, ipsum. Morbi blandit ligula feugiat magna. Nunc eleifend consequat lorem. Sed lacinia nulla vitae enim. Pellentesque tincidunt purus vel magna. Integer non enim. Praesent euismod nunc eu purus. Donec bibendum quam in tellus. Nullam cursus pulvinar lectus. Donec et mi. Nam vulputate metus eu enim. Vestibulum pellentesque felis eu massa. This can be seen at figure 1.1.

Figure 1.1: The castle of Arenberg in Heverlee, with windows corrected.

CHAPTER **2**

Short Manual

We now present some commands that you can use. If you experience any bugs, don't hesitate to report them on the corresponding repository: `https://github.com/hdeplaen/kultem`. If you can fix the bug or just want to improve the work and add a new functionality, don't hesitate to contribute with a push request.

2.1 PACKAGE

To use the package, it suffices to include `\usepackage[<options>]{kultem}`. The package admits the following option

- `sedes`: prints the *Sedes Sapientiae* of the university as watermark on the title page.

2.2 TITLE PAGE

The available title options are (from top to bottom):

- `\title{<text>}`: the title of the document;

- `\subtitle{<text>}`: the subtitle of the document (may be omited);

- `\author{<text>}`: the author of the document;

- `\promoter{<text>}`: the promoter (singular);

- `\promoters{<text>}`: the promoters (plural, seperate the names with a comma or a \\ if you want them to be written on different lines);

- `supercom{<text>}`: supervisory commitee (singular and plural undifferentiated);

- `jury{<text>}`: jury (singular and plural undifferentiated);

- `assessors{<text>}`: assessors (plural, we did not consider the singular option);

- `professor{<text>}`: professor (singular);

- `professors{<text>}`: professors (plural, seperate the names with a comma or a \\ if you want them to be written on different lines);

- `assistant{<text>}`: assistant (singular);

- `assistants{<text>}`: assistants (seperate the names with a comma or a \\ if you want them to be written on different lines);

- `\date{<text>}`: the date (one may consider the command `\today` for an automatic filling).

- `\coverimage{<path_to_image>}`: this prints an image on the cover (to avoid a heavy looking title page, we do not recommend to combine it with the package option `sedes` or the command `\coversvg` and `coverinput`);

- `\coversvg{<path_to_svg>}`: similar to the previous option, but prints an svg on the cover instead of an image (to avoid a heavy looking title page, we do not recommend to combine it with the package option `sedes` or the command `\coverimage` and `coverinput`);

- `\converinput{<path_to_file>}`: similar to the previous option, but allows to directly input a block of code instead of an image, *e.g.* a TikZ picture (to avoid a heavy looking title page, we do not recommend to combine it with the package option `sedes` or the command `\coverimage` and `\coversvg`).

2.3 QUESTIONS AND TASKS

These are two variants of the `enumerate` environment. The can be called apart from each other as in what follows or nested like in the beginning example.

```
\begin{questions}
    \item What is on your bucket list?
    \item What are you most thankful for?
    \item What are you most afraid of?
    \item What are you most passionate about?
\end{questions}
```

1. What is on your bucket list?

2. What are you most thankful for?

3. What are you most afraid of?

4. What are you most passionate about?

```
\begin{tasks}
    \item Correct the \verb|bindingoffset| option;
    \item Implement an image command for the title page.
\end{tasks}
```

i. Correct the `bindingoffset` option;

ii. Implement an image command for the title page.

2.4 KULBOX

The `kulbox[<margin>]{<text>}` command allows you to create a nice blue box containing some text. The default margin is equal to 3pt and we do not advise on changing it and just omit it to use the default value:

```
\kulbox{This is a nice kulbox omiting the margin option.}
```

This is a nice kulbox omiting the margin option.

In case you would however really want to change it, you can specify your custom margin:

```
\kulbox[0pt]{This is an ugly cramped kulbox with no margin.}
```

This is an ugly cramped kulbox with no margin.

```
\kulbox[10pt]{This is an extravagant bulky kulbox with a huge
    margin.}
```

This is an extravagant bulky kulbox with a huge margin.

2.5 BINDINGOFFSET

This adds a default binding offset as in the `geometry` package, with a fixed value of 12mm. You can call it with `\usepackage[bindingoffset]{kultem}`. **Warning:** the headers are for the moment not compatible with this option and will remain unchanged.