Typesetting articles for VMSTA journal

VTeX

v0.1 - 2014/09
v0.2 - 2014/10
v0.3 - 2025/05

latex-support@vtex.lt (VTeX)

1 Introduction

The VMSTA package consists of the instruction manual (vmstadoc.pdf), a sample article (vmsta-sample.tex) and sample BibTeX database (biblio.bib), LaTeX document class (vmsta2.cls), document class configuration (vmsta2-dist.cfg), BibTeX style (vmsta2-mathphys.bst) and the template (vmsta-template.tex).

The LaTeX document class vmsta2.cls is primarily build upon article.cls and depend on the following packages:

- *nimbusserif*, *nimbusmono*, *nimbussans*
- *natbib*
- *graphicx*
- *amsmath*, *amsthm*, *amssymb*
- *newtxmath*
- *geometry*, *xcolor*
- *hyperref*

2 Compiling

Please use lualatex or pdflatex to compile a manuscript.

```
cmd> lualatex paper
cmd> bibtex paper
cmd> lualatex paper
```

3   Front matter

3.1   Title

Setup:

```
\title{A sample document}
\runtitle{A sample running head title}
```

`\runtitle` can be left out commented for short titles.

3.2   Authors and addresses

Setup:

```
\begin{aug}
\author[a]{\inits{F.N.}\fnms{First-Name1}~\snm{Surname-1}%
    \thanksref{cor1}\ead[label=e1]{first@somewhere.com}%
    \orcid{0000-0000-0000-0000}}
\thankstext[type=corresp,id=cor1]{Corresponding author.}
\author[b]{\inits{S.N.}\fnms{First-Name2}~\snm{Surname-2}%
    \thanksref{f1}\ead[label=e2]{second@somewhere.com}}
\thankstext[id=f1]{Some remarks.}

\address[a]{\institution{Institution of the First author}, \\
Street 123, ZIP City, \cny{Country}}
\address[b]{Address of the Second author\\
usually few lines long, \cny{Country}}
\runauthor{F.N. Author, S.N. Author}
\end{aug}
```

Output:

First-Name1 Surname-1[a,*]**, First-Name2 Surname-2**[b,1]

[a]*Institution of the First author,*
Street 123, ZIP City, Country
[b]*Address of the Second author*
usually few lines long, Country

first@somewhere.com (F.N. Surname-1), second@somewhere.com (S.N. Surname-2)

`\author` command has optional parameter, that serves as and identifier, and which can be used in `\address` field to identify address belonging.

Macros `\inits`, `\fnms`, `\snm` stands for author's initials, first name and surname accordingly.

Use `\thanksref{cor1}` and `\thankstext[type=corresp,id=cor1]{...}` macro to identify and print corresponding author(s).

Email address should be provided in a `\ead[label=...]...` macro.

Use `\runauthor` if automatic running head authors failed.

3.3   Abstract

```
\begin{abstract}
Abstract ..
\end{abstract}
```

3.4   Keywords

```
\begin{keyword}
\kwd{keyword-1}
\kwd{keyword-2}
\end{keyword}

\begin{keyword}[MSC2020]
\kwd{msc-keyword-1}
\kwd{msc-keyword-2}
\end{keyword}
```

4   Floats

Figures may be included using the command `\includegraphics` in combination with options if needed.

`\includegraphics` is provided by graphicx.sty package which is part of standard LATEX distribution. graphicx.sty is loaded by default.

5   Theorems and theorem like environments

The class file vmsta2.cls by default loads amsthm package, which provides three theorem styles – *plain*, *definition*, *remark*.

```
\theoremstyle{plain}\newtheorem{thm}{Theorem}
\theoremstyle{definition}\newtheorem{def}{Definition}

\begin{thm}[Quantitative theorem]
Quae semper tutum est medium inter homines et deum, pro culpis remedium.
\end{thm}

\begin{proof}
The theorem is proved.
\end{proof}
```

Output:

> **Lemma 1.** *Maria virgo illa dulcis, praedicata de propheta porta orientalis. Tempus puta-tionis advenit. Illa sacra et felix porta, per quam mors fuit expulsa, introduxit autem vitam.*
>
> **Proof.** The lemma is proved.   □

6   Enumerated and itemized lists

Standard LATEX enumerate and itemize environments should be used.

7   Cross-references

In electronic publications, articles may be internally hyperlinked. Hyperlinks are generated from proper cross-references in the article. For example, the words Fig. 1 will never be more than simple text, whereas the proper cross-reference `\ref{dice}` may be turned into a hyperlink to the figure itself: Fig. 1.

8   Bibliography

Use BibTeX database and vmsta2-mathphys.bst style for bibliography items.

```
\bibliographystyle{vmsta2-mathphys}
\bibliography{biblio}% your bibliography database
```

To produce bbl file issue:
cmd> `bibtex paper`
in a command prompt.
You will get highly customised bbl file.

9   Submission

Please submit a single zip file which contains the following files:

- paper.tex
- paper.pdf
- paper.bbl
- img/*.eps,*.pdf   (EPS or PDF images)
- <your-file>.bib   BibTeX data base