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<http://www.math.clemson.edu/>



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Presentations with \LaTeX
Adapted from the documentation of
`ifmslide.sty`
by
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Louis Ntasin

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Introduction



The Almighty Powerpoint



Slide Development Packages in Latex

1. slide
2. pdfscreen
3. pdfslide
4. prosper
5. Utopia Presentation Bundle
6. Web Package
7. ifmslide
8. etc ...



Slide Enhancement Tools

- PPower4
- TexPower
- etc ...



About ifmslide.sty

What can ifmslide.sty do for you?

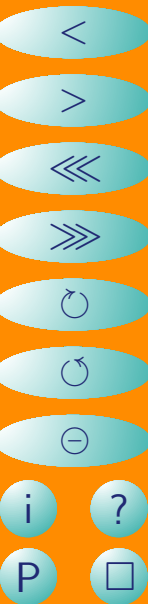
You like to do nice presentations of your business with beamers or on a screen?

You are not sure that all these things work when you need them?

You feel better with a stack of printed slides in your bag?

ifmslide.sty provides both: getting a presentation with PDF \LaTeX and printouts with \LaTeX and - as a side effect - simple production of your slides using your favourite DVI-viewer.^a You don't need PPower4 to get all these nice effects with page-transitions and stepwise building of the pages. All you need is texpower [1] and hyperref [2] for the links and buttons etc. ifmslide.sty makes use of the special features of the classes seminar and powersem (part of T \LaTeX Power).

^aThis is **not** pdfslide [3] as it seems to be in a first view. It was indeed developed from that style but now completely rewritten with many new features implemented and functionally extended. pdfslide cannot produce printouts without generating a PDF-file and rescaling the output with all difficulties.



Features

... produces DVI (\LaTeX) for printouts and PDF ($\text{PDF}\text{\LaTeX}$) for direct presentation.

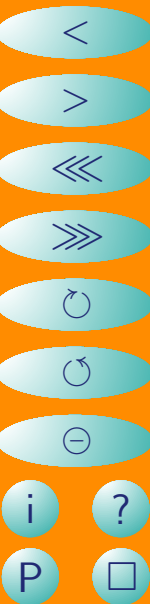


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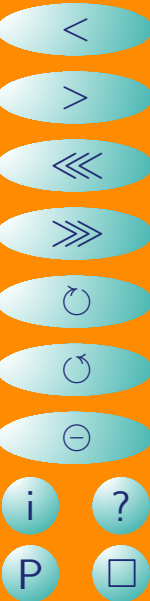
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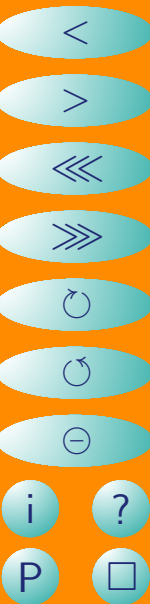
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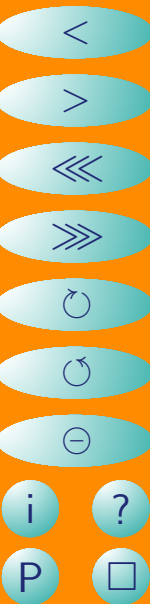


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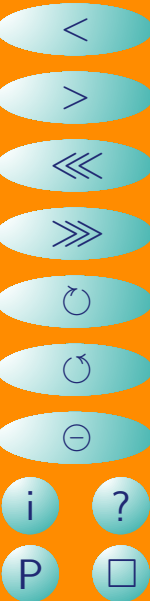


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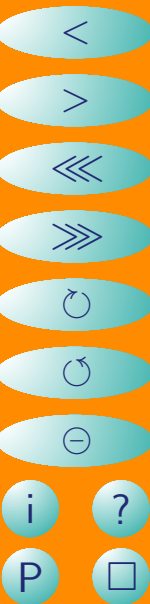
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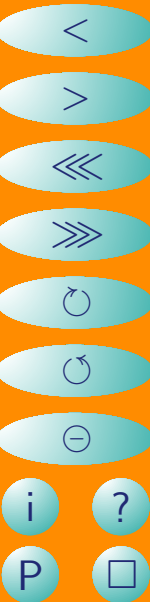
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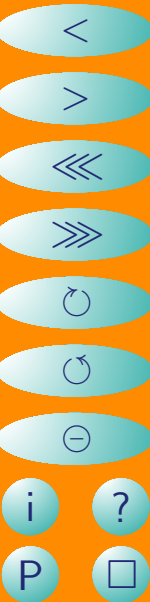
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- ... changing the size of your slide...



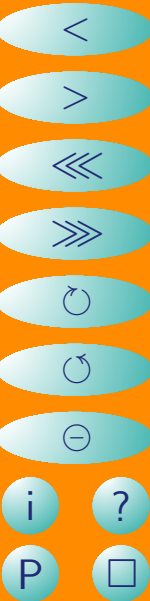
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- ... you can use most of the features of the seminar-package: magnification etc.

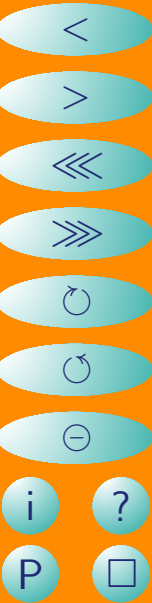


Options

The following options are provided:



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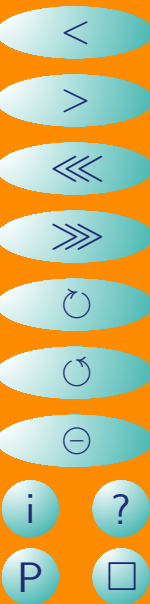
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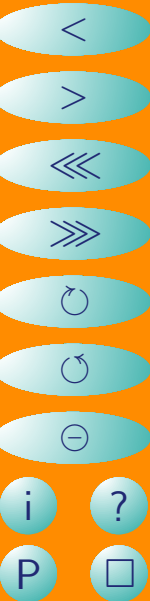
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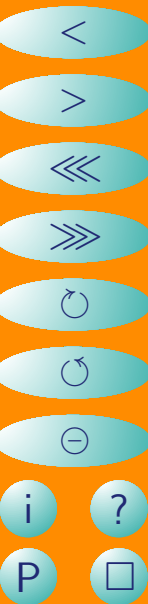
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turn the navigation buttons on and sets the style. Just try it...



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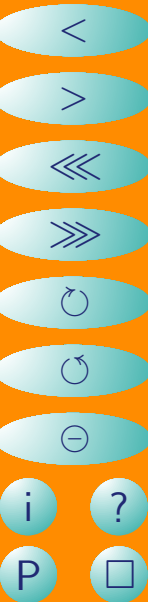
turn the navigation buttons on and sets the style. Just try it...

button

use definable buttons together with the last option instead of just putting a box around the signs.



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Pagestyles

sidebar, panel

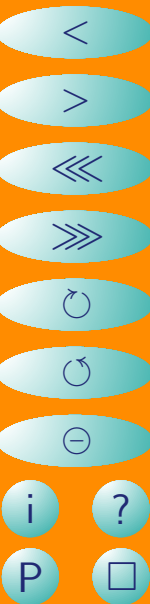
Switch the navigation panel on.

plain, myheadings, headings are redefined to it.

You can put the panel at all positions with `\panelposition`



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Pagestyles

empty

No panel – only a frame and background.

But you can put a panel outside of the frame with `\panelposition` which is not present in \LaTeX -mode and outside of the normal papersize in PDF \LaTeX -mode!

Pagestyles

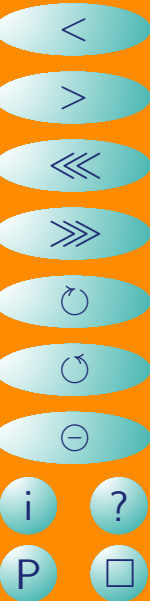
panelposition

`\panelposition{left/right/top/bottom}` changes the position of the panel to the given value. The slide is recalculated for every position...

`\panelposition{outsidebottom}` set a panel outside of the paper!

`\panelposition{empty}` set no panel which is in practice useful with

`\pagestyle{empty}` only.





Panel on top



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Panel left

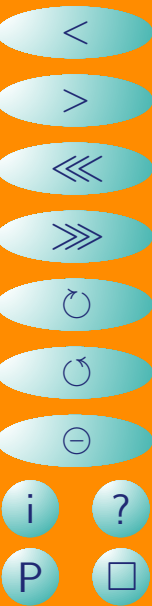


Panel on bottom






Panel right



Panel outsidebottom (you cannot see it on the printed slides)!

Buttons and logo

If you don't like to put the buttons and the logo into the panel, you can release them with `\releaselogo` and `\releasebutton`. `\catchbutton` catches them ;-). 

`\buttonsize(widthmax,heightmax)(distanceh,distancev)` gives the maximal size of the buttons (aspectratio is kept) and the distance between the buttons without length. Keep in mind that the frame and the panel is placed into a picture-environment with `\unitlength=1mm` and all positions given in *mm*.

`\freebutton(posx,posy)[h/v]` is the position of the buttons and the direction [h] for horizontal and [v] for vertical buttons. For horizontal buttons the anchor is the lower right point of the right button and for vertical buttons the point between the lowest buttons.

Use `\nobuttons` to disable buttons all over (e.g. for slides).

`\freelogo(posx,posy)[width]` the anchor for the position is the lower left point of the logo, the width should be clear.

If you think that the pagecounter is too lonely in PDF-mode switch him off with `\pagecounter[off/on]`.





useful application for this feature....





Background

Older versions of `ifmslide.sty` provide `\pagestyle{background}` which makes objectively no sense, due to the fact that one needs a background but no panel or vice versa. The `\background{filename}` command substitute it together with the switches `\showbackground` and `\hidebackground`.

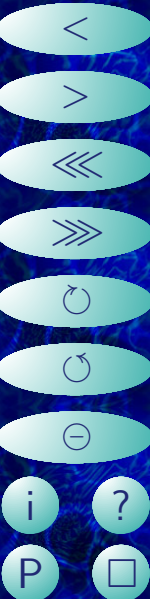
A new feature for the panel-background is:

```
\paneltile[on/off](cutllx,cutlly,cuturx,cutury){filename}
```

which is now fully experimental which means that it can change it's definition and possibilities in further versions. Presently it works only for vertical panels. It takes a picture^a and fill the panel with tiles of it. It takes one tile in x-direction and so many as needed to fill in y-direction. There is still a rest which is filled by a part of the picture defined by the four cut-values...

That did not work in all cases and in PDF-mode the rest of the tile is printed outside the visible area, but it is pre-alpha so what.

^a.jpeg etc. in PDF-mode and it's EPS-version for DVI-mode (produced with some tool like xv)



Useful commands

`\setInsideMargin{left}{right}{top}{bottom}` set the extra margins inside the frame. This is the easiest way to improve your output.





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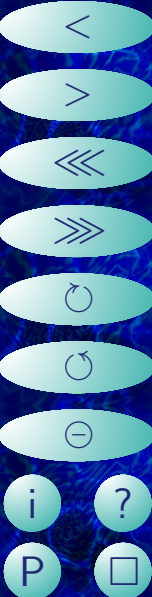
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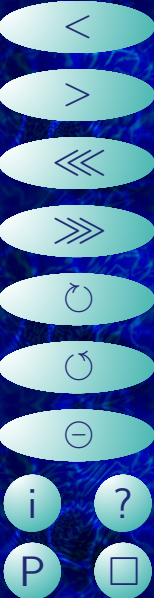
Make own buttons and use them with `\OnButton{file}`, `\OffButton{file}` and `\DraftButton{file}`.

There is a tiny script called `genbutton` coming with `ifmslide.sty` which can be used to change the color of the standard buttons (`button1..`) and write new buttons.



Hints

The file `ifmslide.cfg` can be changed to set up global or local values such as colors, the logo, backgrounds, sizes, the `baseurl` of your company, buttons, margins ... without changing `ifmslide.sty` itself.



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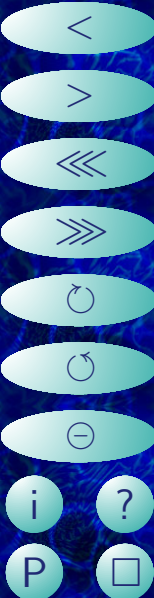
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Change font sizes with `\slidesmag{mag}` and `\ptsize{size}` from `seminar.sty`.



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Produce an EPS and a PDF-version^a of your pictures and include them with `\includegraphics[height=5\semcm,width=4\semcm]{file}`^b



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Further information about `\step`, `\pause`, `\href`, slides and other stuff can be found in the manuals for the packages `texpower` [1], `hyperref` [2] and `seminar`.

^a`epstopdf` is a good tool to convert eps and the `graphicx` package knows many formats...

^bfile is the filename without suffix



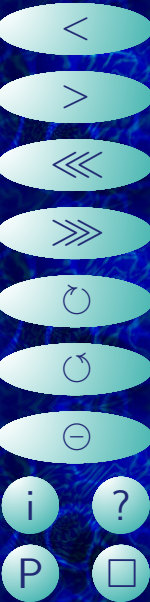
Viscoelastic Flow equations

Find (τ, u, p) such that

$$\begin{aligned}\lambda(u \cdot \nabla)\tau + \lambda\frac{\gamma}{\alpha}(\tau \cdot \tau) + \lambda\beta_a(\tau, \nabla u) - 2\alpha\mathbf{d}(u) &= 0 \quad \text{in } \Omega, \\ -2(1 - \alpha)\nabla \cdot \mathbf{d}(u) - \nabla \cdot \tau + \nabla p &= f \quad \text{in } \Omega, \\ \nabla \cdot u &= 0 \quad \text{in } \Omega, \\ u &= 0 \quad \text{on } \Gamma.\end{aligned}\tag{1}$$



An aligned equation



An aligned equation

$$\sum_{i=1}^n i$$

(2)

(3)

(4)

(5)



An aligned equation

$$\sum_{i=1}^n i = 1 + 2 + \cdots + (n - 1) + n \quad (2)$$

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(5)



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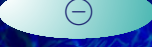
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(5)



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Page Transition.

`\pageTransitionSplitHO` – Split Horizontally to the outside.

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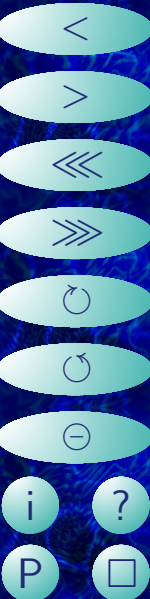


Page Transition continued.....



\pageTransitionBlindsV – Vertical Blinds.

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References

- [1] texpower-Package: *Stephan Lehmke*, (Stephan.Lehmke@cs.uni-dortmund.de), [University of Dortmund](#) or CTAN in the future.
- [2] hyperref-Package: *Sebastian Rahtz*, www.tug.org
- [3] pdfslide.sty: *C. V. Radhakrishnan*, (cvr@river-valley.com), [CTAN-archive](#).
- [4] ifmslide.sty: *Thomas Emmel*, (emmel@mechanik.tu-darmstadt.de), .

