Hello, world!

To compile this latex file into a pdf file

> *pdflatex hello.tex*

this is bold text

this is italicized
underlined text
bold & italicized

Use the `color` package to change the color of elements in LaTeX.

- First item

- Second item

Here is an example of a language definition
$\sum = \{0, 1\}$
{ w is any string of the form 00^*1111^*0 }

A DFA M may be defined as

$M = \{Q, \sum, \delta, q_0, F\}$
where Q is the set of states
$\sum$ is the set of symbols in the alphabet
δ is the transition function
q_0 is the start state
$F \subseteq Q$ is the set of final states

For example

$Q = \{q_0, q_1, q_2\}$
$\sum = \{0, 1\}$
$F = \{q_2\}$
$q_0 = q_0$
$\delta = \{((q_0, 0), q_1), ((q_0, 1), q_0), ((q_1, 0), q_2), ((q_1, 1), q_1)\}$

In Table form:

	0	1
q_0	q_0	q_1
q_1	q_2	q_1
q_2	q_0	q_2