At first we need a grid as an overlay to calculate the coordinates for the polygon. To get proper coordinates we define the x-unit as mm and the y-unit as \baselineskip

We have a columnwidth of 8mm and a \tabcolsep of 2mm. For the x-unit we have to take the \tabcolsep twice, because it is the half column separation.


```
1   \tabcolsep=2mm%
2   \psset{xunit=12mm, yunit=\baselineskip}%
3   \begin{tabular}{*{8}{p{8mm}}}
4     H  &    &    &    &    &    &    & He\\
5     Li & Be & B  & C  & N  & O  & F  & Ne\\
6     Na & Mg & Al & Si & P  & S  & Cl & Ar\\
7     K  & Ca & Ga & Ge & As & Se & Br & Kr\\
8     Rb & Sr & In & Sn & Sb & Te & I  & Xe\\
9     Cs & Ba & Tl & Pb & Bi & Po & At & Rn\\
10    Fr & Ra & 112&    & 114&    &    &  \\
11  \end{tabular}
12
13  \rput(0,3.5){\psgrid[subgriddiv=0, gridlabels=7pt
        ](0,-4)(8,4)}
```

```
1  \tabcolsep=2mm%
2  \psset{xunit=12mm, yunit=\baselineskip}%
3  \pspolygon%
4    [fillcolor=lightgray,fillstyle=solid,linestyle=none
       ]
5    (0,-3.3)(0,2.7)(2,2.7)(2,1.7)(4,1.7)(4,0.7)(6,0.7)
6    (6,-1.3)(7,-1.3)(7,-2.3)(5,-2.3)(5,-3.3)(4,-3.3)
7    (4,-2.3)(3,-2.3)(3,-3.3)
8  \begin{tabular}{*{8}{p{8mm}}}
9    H  &    &    &    &    &    &    & He\\
10   Li & Be & B  & C  & N  & O  & F  & Ne\\
11   Na & Mg & Al & Si & P  & S  & Cl & Ar\\
12   K  & Ca & Ga & Ge & As & Se & Br & Kr\\
13   Rb & Sr & In & Sn & Sb & Te & I  & Xe\\
14   Cs & Ba & Tl & Pb & Bi & Po & At & Rn\\
15   Fr & Ra & 112&    & 114&    &   &\\
16 \end{tabular}
```

H							He
Li	Be	B	C	N	O	F	Ne
Na	Mg	Al	Si	P	S	Cl	Ar
K	Ca	Ga	Ge	As	Se	Br	Kr
Rb	Sr	In	Sn	Sb	Te	I	Xe
Cs	Ba	Tl	Pb	Bi	Po	At	Rn
Fr	Ra	112		114			

```
1  % 8mm = 4 mm Width + 2\tabcolsep mit \tabcolsep=2mm
2  \tabcolsep=2mm%
3  \psset{xunit=8mm, yunit=\baselineskip}%
4  \psline[linecolor=red,linewidth=2pt](0,0.25)(8,0.25)%
5  \psline[linecolor=red,linewidth=2pt](5.5,-3.25)
       (5.5,3.75)%
6  \begin{tabular}{*{8}{p{4mm}}}
7    H  &    &    &    &    &    &    & He\\
8    Li & Be & B  & C  & N  & O  & F  & Ne\\
9    Na & Mg & Al & Si & P  & S  & Cl & Ar\\
10   K  & Ca & Ga & Ge & As & Se & Br & Kr\\
11   Rb & Sr & In & Sn & Sb & Te & I  & Xe\\
12   Cs & Ba & Tl & Pb & Bi & Po & At & Rn\\
```

```
13    Fr & Ra & 112&      & 114&      &      &
14  \end{tabular}
15
16  %%% the following line only for viewing the
        coordinates
17  %\rput(0,3.5){\psgrid[subgriddiv=0, gridlabels=7pt
        ](0,-4)(8,4)}
```

$$\begin{pmatrix} a & b & c & d & e \\ a & b & c & d & e \\ a & b & c & d & e \\ a & b & c & d & e \\ a & b & c & d & e \\ a & b & c & d & e \end{pmatrix}$$

```
1   \[
2   \begin{pmatrix}
3   a & b & c & d & e\\
4   a & b & c & d & e\\
5   a & b & c & d & e\\
6   \rnode{A}{a} & b & c & d & \rnode{B}{e}\\
7   a & b & c & d & e\\
8   a & b & c & d & e
9   \end{pmatrix}
10  \]
11  \pcline[linecolor=red,nodesep=-0.5em](A)(B)
```