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{\setlength{\TabTitreL}{1cm}
\begin{MonTableau}{3}{6}{.75}

\small

\TabNewCol{0}
\rTabPut{Br}{-.15}{.25}{x}
\rTabPut{Br}{-.15}{.40}{x}
\rTabPut{Br}{-.15}{.40}{x^2-12}
\rTabPut{Br}{-.15}{.40}{f(x)}

\TabNewCol{0}
\rTabPut{Bl}{.15}{.25}{-\infty}

\TabNewCol{.25}
\rTabPut{B}{0}{.25}{-2\sqrt{3}}
\rTabPut[1]{B}{0}{.40}{}
\rTabPut[2]{B}{0}{.40}{\TabZ}
\rTabPut[2]{B}{0}{.40}{\TabZ}

\TabNewCol{.5}
\rTabPut{B}{0}{.25}{\TabZ}
\rTabPut[2]{B}{0}{.40}{\TabZ}
\rTabPut[1]{B}{0}{.40}{}
\rTabPut[2]{B}{0}{.40}{\TabZ}

\TabNewCol{.75}
\rTabPut{B}{0}{.25}{2\sqrt{3}}
\rTabPut[1]{B}{0}{.40}{}
\rTabPut[2]{B}{0}{.40}{\TabZ}
\rTabPut[2]{B}{0}{.40}{\TabZ}

\TabNewCol{1}
\rTabPut{Br}{-.1}{.25}{+\infty}

\rput(.125,.5){-}\rput(.375,.5){-}\rput(.625,.5){+}\rput(.875,.5){+}
\rput(.125,1.5){+}\rput(.375,1.5){-}\rput(.625,1.5){-}\rput(.875,1.5){+}
\rput(.125,2.5){-}\rput(.375,2.5){+}\rput(.625,2.5){-}\rput(.875,2.5){+}

\end{MonTableau}}

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Ce qui donne :

- $\forall x \in \mathbb{R} \quad f(x) = x(x - 2\sqrt{3})(x + 2\sqrt{3})$ .
- Un produit de facteur est nul si, et seulement si, au moins est de ses facteurs est nul :

$$f(x) = 0 \Leftrightarrow x \in \{-2\sqrt{3}; 0; 2\sqrt{3}\}$$

- Tableau de signes ci-contre :

$$f(x) < 0 \Leftrightarrow x \in ]-\infty; -2\sqrt{3}[ \cup ]0; 2\sqrt{3}[$$

	$x$	$-\infty$	$-2\sqrt{3}$	$0$	$2\sqrt{3}$	$+\infty$
$x$		-	-	0	+	+
$x^2 - 12$		+	0	-	0	+
$f(x)$		-	0	+	0	+

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{\setlength{\TabTitreL}{1cm}
\begin{MonTableau}{1}{9}{1.5}

\psframe[style=hachured,linestyle=none](.3,1)(.45,0)

\TabNewCol{0}
\rTabPut{Br}{-.15}{.25}{\$x\$}
\rTabPut{Br}{-.15}{.40}{\$f(x)\$}

\TabNewCol{0}
\rTabPut{B1}{.15}{.25}{\$0\$}
\rTabPut{B1}{.15}{.60}{\$\frac{3}{2}\$}

\TabNewCol{.30}
\rTabPut{B}{0}{.25}{\$1\$}
\rTabPut{Br}{-.15}{.80}{\${+\infty}\$}
\psline[style=TabDblBarre](.3,0)(.3,1)

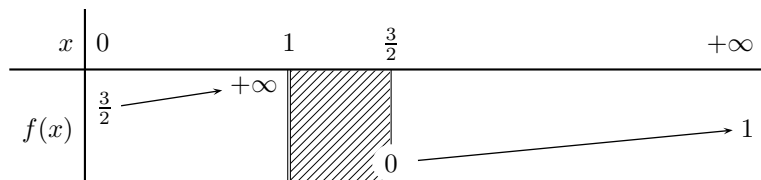
\TabNewCol{.45}
\rTabPut{B}{0}{.25}{\$\frac{3}{2}\$}
\rTabPut[2]{B}{0}{.10}{\TabZ}

\TabNewCol{1}
\rTabPut{Br}{-.15}{.25}{\${+\infty}\$}
\rTabPut{Br}{-.15}{.40}{\$1\$}

\TabFleche{B1}{C1}
\TabFleche{D1}{E1}

\end{MonTableau}}

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\begin{MonTableau}{6}{12}{1.2}

\TabNewCol{0}
\rTabPut{B}{-.75}{.25}{\$t\$}
\rTabPut{B}{-.75}{.20}{\TabTitre{Sgn.}{x'(t)}}
\rTabPut{B}{-.75}{.20}{\TabTitre{Var.}{x}}
\rTabPut{B}{-.75}{.20}{\TabTitre{Var.}{y}}
\rTabPut{B}{-.75}{.20}{\TabTitre{Sgn.}{y'(t)}}
\rTabPut{B}{-.75}{.40}{\$\vec{T}\$}
\rTabPut{B}{-.75}{.40}{\$m_T\$}

\TabNewCol{0}
\rTabPut{B}{.5}{.25}{\$0\$}
\rTabPut{B}{.5}{.40}{\$1,5\$}
\rTabPut{B}{.5}{.40}{\$2\$}
\rTabPut{B}{.5}{.15}{\$0\$}
\rTabPut{B}{.5}{.40}{\$1,5\$}
\rTabPut{B}{.5}{.40}{\$\coordp{1,5}{1,5}\$}
\rTabPut{B}{.5}{.40}{\$1\$}

% On recopie 4 fois cette dernière colonne et on ajuste
\TabNewCol{.25}
\rTabPut{B}{0}{.25}{\$1\$}
\rTabPut{B}{0}{.40}{\$0\$}
\rTabPut{B}{0}{.75}{\$4\$}
\rTabPut{B}{0}{.60}{\$4\$}
\rTabPut{B}{0}{.40}{\$3\$}
\rTabPut{B}{0}{.40}{\$\coordp{0}{3}\$}
\rTabPut{B}{0}{.40}{\$\infty\$}

\TabNewCol{.5}
\rTabPut{B}{0}{.25}{\$2\$}\rTabPut{B}{0}{.40}{\$-1.5\$}
\rTabPut{B}{0}{.40}{\$2\$}\rTabPut{B}{0}{.75}{\$6\$}
\rTabPut{B}{0}{.40}{\$0\$}\rTabPut{B}{0}{.40}{\$\coordp{-1.5}{0}\$}
\rTabPut{B}{0}{.40}{\$0\$}

\TabNewCol{.75}
\rTabPut{B}{0}{.25}{\$3\$}\rTabPut{B}{0}{.40}{\$0\$}
\rTabPut{B}{0}{.15}{\$0\$}\rTabPut{B}{0}{.60}{\$4\$}
\rTabPut{B}{0}{.40}{\$-2\$}\rTabPut{B}{0}{.40}{\$\coordp{0}{-2}\$}
\rTabPut{B}{0}{.40}{\$\infty\$}

\TabNewCol{1}
\rTabPut{B}{-.5}{.25}{\$4\$}\rTabPut{B}{-.5}{.40}{\$1\$}
\rTabPut{B}{-.5}{.40}{\$2\$}\rTabPut{B}{-.5}{.15}{\$0\$}
\rTabPut{B}{-.5}{.40}{\$1,5\$}\rTabPut{B}{-.5}{.40}{\$\coordp{1}{-1}\$}
\rTabPut{B}{-.5}{.40}{\$-1\$}

% les signes + et - on fait tout simplement
\rput(.145,0.5){\$+\$}\rput(.145,3.5){\$+\$}
\rput(.375,0.5){\$-\$}\rput(.375,3.5){\$+\$}
\rput(.625,0.5){\$-\$}\rput(.625,3.5){\$-\$}
\rput(.850,0.5){\$+\$}\rput(.850,3.5){\$-\$}

% les flèches
\TabFleche{B2}{C2}\TabFleche{C2}{D2}\TabFleche{D2}{E2}\TabFleche{E2}{F2}
\TabFleche{B3}{C3}\TabFleche{C3}{D3}\TabFleche{D3}{E3}\TabFleche{E3}{F3}

\TabTitreFerme\TabFerme
\end{MonTableau}

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$t$	0	1	2	3	4				
<b>Sgn.</b> $x'(t)$	1,5	+	0	-	-1.5	-	0	+	1
<b>Var.</b> $x$	2	→ 4		→ 2		→ 0		→ 2	
<b>Var.</b> $y$	0	→ 4		→ 6		→ 4		→ 0	
<b>Sgn.</b> $y'(t)$	1,5	+	3	+	0	-	-2	-	1,5
$\vec{T}$	$\begin{pmatrix} 1,5 \\ 1,5 \end{pmatrix}$	$\begin{pmatrix} 0 \\ 3 \end{pmatrix}$	$\begin{pmatrix} -1,5 \\ 0 \end{pmatrix}$	$\begin{pmatrix} 0 \\ -2 \end{pmatrix}$	$\begin{pmatrix} 1 \\ -1 \end{pmatrix}$				
$m_T$	1	$\infty$	0	$\infty$	-1				