**6A Introduction to Matrices**

1. Write the dimensions of the following matrices
2. $\left[\begin{matrix}2&-1\\1&3\end{matrix}\right]$
3. $\left[\begin{matrix}1&0&2\end{matrix}\right]$
4. $\left[\begin{matrix}4\\-1\end{matrix}\right]$
5. $\left[\begin{matrix}3&2\\-1&1\\0&-3\end{matrix}\right]$
6. Find the value of:
7. $\left[\begin{matrix}2&-1\\0&3\end{matrix}\right]+\left[\begin{matrix}-1&4\\5&3\end{matrix}\right]$
8. $\left[\begin{matrix}1&-3\\4&2\\1&1\end{matrix}\right]-\left[\begin{matrix}0&2\\1&-5\\-3&2\end{matrix}\right]$
9. Given that **A** + **B** = **C**, find the values of a, b, x and y

$A=\left[\begin{matrix}2&3\\1&a\end{matrix}\right]$, $B=\left[\begin{matrix}b&-1\\2&4\end{matrix}\right]$, $C=\left[\begin{matrix}3&y\\x&3\end{matrix}\right]$

1. Given

$A=\left[\begin{matrix}1&2\\-1&0\end{matrix}\right]$, $B=\left[\begin{matrix}6&0&-4\end{matrix}\right]$

1. Find the value of 2**A**:
2. Find the value of 1/2**B**:
3. Given that **A** + 2**B** = **C**, find the values of a, b and c

$A=\left[\begin{matrix}a&0\\1&2\end{matrix}\right]$, $B=\left[\begin{matrix}1&b\\0&3\end{matrix}\right]$, $C=\left[\begin{matrix}6&6\\1&c\end{matrix}\right]$