Texas Instruments BAII PLUS

Using the Cash Flow Register:

Consider the following cash flow pattern:

<table>
<thead>
<tr>
<th>Year</th>
<th>CF</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>50</td>
</tr>
<tr>
<td>2</td>
<td>100</td>
</tr>
<tr>
<td>3</td>
<td>500</td>
</tr>
<tr>
<td>4</td>
<td>250</td>
</tr>
</tbody>
</table>

If your opportunity cost rate is 9 percent, the cash flow time line for this project is:

0 9% 1 2 3 4

50 100 500 250

This represents an uneven cash flow stream. To solve for the present value of this cash flow pattern, follow these steps:

Press \[ \text{CF} \] \hspace{1cm} \text{This opens the cash flow register.}

Press \[ \text{2ND} \hspace{0.2cm} \text{CLR WORK} \] \hspace{1cm} \text{This clears any numbers that might be in the CF register from previous work. } CF_0 = 0 \text{ should be displayed. For this problem, the cash flow in Period 0 is 0, so } CF_0 = 0 \text{ is appropriate.}

Press \[ \text{ } \downarrow \text{ ENTER} \] \hspace{1cm} \text{Enter 50 and press } \text{C01 } = \text{ 50 should be displayed}

Press \[ \text{ } \downarrow \text{ } \downarrow \] \hspace{1cm} \text{F01 } = \text{ 1 should be displayed; this indicates the frequency, or number of times, the C01 value occurs in in consecutive years. Because 50 is received in Year 1 but not in Year 2, F01 } = \text{ 1. If 50 is receive in Year 1 and Year 2, you could change F01 to 2.}

Press \[ \text{ } \downarrow \text{ ENTER} \] \hspace{1cm} \text{Enter 100 and press } \text{C02 } = \text{ 100 should be displayed}

Press \[ \text{ } \downarrow \text{ } \downarrow \] \hspace{1cm} \text{F02 } = \text{ 1 should be displayed; the interpretation of this number is the same as for F01.}

Press \[ \text{ } \downarrow \text{ ENTER} \] \hspace{1cm} \text{Enter 500 and press } \text{C03 } = \text{ 500 should be displayed}

Press \[ \text{ } \downarrow \text{ } \downarrow \] \hspace{1cm} \text{F03 } = \text{ 1 should be displayed; the
interpretation of this number is the same as for F01.

Press $\downarrow$; Enter 250 and press $\text{ENTER}$  

C04 =  

250 should be displayed

Press $\text{NPV}$;  

I =  

0 should be displayed; this indicates that you must enter the interest rate, which is the required rate of return before the NPV can be computed.

Enter 9 and press $\text{ENTER}$  

I =  

9 should be displayed

Press $\downarrow$;  

NPV =  

0 should be displayed; the NPV has not been computed yet.

Press $\text{CPT}$;  

NPV =  

693.237018 should be displayed. This is the PV of the cash flows given in the time line.