Case 1:

Maine Company is considering Projects S and L, whose cash flows are shown below. These projects are mutually exclusive, equally risky, and are not repeatable.

WACC: 7.75%

Year 0 1 2 3 4

CFS −$2,000 $1,500 $1,200

CFL −$2,000 $800 $800 $800 $800

Answer the following questions:

1. Calculate NPV, IRR, and MIRR for Project S and L. (Please copy and paste your excel function in here as your work detail).
2. If the decision is made by choosing the project with the higher IRR, how much value will be forgone?
3. Explain the underlying cause of ranking conflicts between NPV and IRR.

Case 2:

Bangor Moving Company is thinking of opening a new warehouse, and the key data are shown below. The company owns the building that would be used, and it could sell it for $100,000 after taxes if it decides not to open the new warehouse. The equipment for the project would be depreciated by the straight-line method over the project's 3-year life, after which it would be worth nothing and thus it would have a zero salvage value. No new working capital would be required, and revenues and other operating costs would be constant over the project's 3-year life. What is the project's NPV? (Hint: Cash flows are constant in Years 1-3.)

You can work on this case in excel and copy your step-by-step answer here.

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| Project cost of capital (r) | 10.0% |
| Opportunity cost | $100,000 |
| Net equipment cost (depreciable basis) | $65,000 |
| Straight-line deprec. rate for equipment | 33.333% |
| Sales revenues, each year | $123,000 |
| Operating costs (excl. deprec.), each year | $25,000 |
| Tax rate | 25% |