

## NBN – Comments on the IRR

NBN Co. says that it will generate an internal rate of return (IRR) of 7.1% (Exhibit 9-1 in the Corporate Plan). It does not do this on cash-flows to 2040. In Exhibit 1 below, all figures are taken from the corporate plan (with some interpolation). Leveraged cash flow is the cash flow available to shareholders after interest on debt.

The claimed 7.1% IRR depends upon the terminal value assumed for the NBN. The required terminal value to achieve 7.1% is approximately \$95 billion.

Is \$95 billion a reasonable assumption? There are two approaches to estimating terminal value. One is to project cash flows beyond 2040. In Exhibit 1 below, the growth in cash flows starts to level out. If the 4% growth between 2028 and 2040 were extrapolated, it would take another 21 years to get the required terminal value. If cash flows flat-lined from 2040, the terminal value would be \$65 billion and the IRR would be 6.3%.

Alternatively, equity analysts tend to look at the ratio of economic value (EV) to the EBITDA (earnings before interest tax and depreciation) in the final year of projected cash flows. According to the corporate plan, the EBITDA in 2040 is \$11.2 billion. The resulting ratio is 8 (\$95bn/\$11bn); which looks very high for a mature (at 2040) regulated utility. It may be even higher as EBITDA in 2040 looks very high with a margin (EBITDA/revenue) of 77% compared with 40% for Telstra in 2012. If the terminal value is over-stated, then the IRR of 7.1% is also over-stated.

**Exhibit 1: NBN Cash Flows**

