This document describes how to use a single pole relay to change-over between the input supply and the battery back-up. Figure 1 below, is the simplest method however this does have the slight disadvantage of having a momentary break in the output supply when the relay switches off (see Figure 2).

If this is not practical and the output needs be supplied continuously, then this can be achieved with the addition of only a three extra components.

Figure 3 shows the addition of a zener, a transistor and a resistor, this increases the relay switch off threshold. In this example ZD1 is an 8V2 zener, which will result in the relay switching off when the supply rail drops to ~9V.