

Battery Health	• Battery degrades linearly from new to it's end of life value of 80%	20%
	• Battery parameters restrict battery to perform under normal use case, 5000 cycles for a max depth of discharge of 80%	40%
	• Battery does not overheat is temperature controlled and allowed to cool over weekends so does temperatures effect is assumed reliable	20%
	• Effect of depth of discharge and discharge rate on battery health is negligible based on normal constraints (effects discussed as secondary results)	80%
	• Normal working parameters prevent over depletion or over charging from occurring	10%
	• Battery cycle life instantaneously degrades when charging	10%
Battery Usage	• Battery efficiency losses occur only when charging	20%
	• Trickle charging and minimum charge rate employed	10%
	• Battery has health monitoring equipment, allowing it's health to be optimised	20%
Battery Costs	• Current Powerpack 2 costs are used to evaluate the cost of the investment. Assumed that the price will decrease and performance of battery's will improve at the time of the new campus build. Current costs are therefore used as a worst case scenario	5%
	• Installation costs have been assumed negligible due to new campus build absorbing this	30%
	• Maintenance cost assumed not applicable , as this cost will be very small	30%