For KC Corp, to apply method **a**:

The fair value (gross carrying amount) must be 5/3 × $300,000 = $500,000. In order to have the carrying amount equal to the fair value after two years, the balance in accumulated depreciation needs to be $200,000. Therefore, the cost of the equipment must increase by $300,000 ($500,000 − $200,000), and accumulated depreciation must increase by $120,000 ($200,000 − $80,000). In other words, we must restate the equipment and the accumulated depreciation so that the ratio of net carrying amount to gross carrying amount is 60% ($120,000/$200,000) and the net carrying amount is thus $300,000. New gross carrying amount is calculated as $300,000/60% = $500,000.

	Original		Revaluation		Total	Percent
Gross Amount	$200,000	+	$300,000	=	$500,000	100
Accumulated Amortization	80,000	+	120,000	=	200,000	40
Carrying Amount	$120,000	+	$180,000	=	$300,000	60

The journal entry for revaluation on June 30, 2015 is:

June 30	Equipment	300,000	
	Accumulated Depreciation—Equipment		120,000
	Revaluation Surplus—Equipment		180,000
	To revalue equipment with accumulated depreciation.		

For KC Corp, to apply method **b**:

Eliminate accumulated depreciation of $80,000 and then increase the equipment by $180,000 so the carrying amount is $300,000 (= $200,000 − $80,000 + $180,000).

The journal entries for revaluation on June 30, 2015 are:

June 30	Accumulated Depreciation—Equipment	80,000	
	Equipment		80,000
	To eliminate accumulated depreciation for revaluation.		

June 30	Equipment	180,000	
	Revaluation Surplus—Equipment		180,000
	To revalue equipment.		

Impairment

A reporting entity has to calculate its assets' carrying amounts, which are after deducting any accumulated depreciation (amortization) and accumulated impairment losses. An **impairment** is the amount by which the carrying amount of an asset exceeds its recoverable amount. **IAS 36 *Impairment of Assets*** provides detailed guidance on this matter. For example, if a company has specialized machines that can manufacture only DVDs, then these machines would be useless once the market switches completely to Blu-ray disks. These machines have to be tested for impairment losses (details on impairment test are in advanced courses).

For example, equipment bought before 2015 has a carrying amount of $8,000 ($9,000 cost less $1,000 accumulated depreciation) and a recoverable amount of $7,500. The journal entry to record this impairment on December 31, 2015 is:

Dec. 31	Impairment Loss–Equipment	500	
	Accumulated Depreciation and Impairment Loss–Equipment		500
	To record impairment loss on equipment		

Some companies record depreciation and impairment in the same accumulated account as shown above.