

LECTURE 9: INTRAGROUP TRANSACTIONS (& NCI effect)

- Current period transaction (how long from starting date of the reporting period?)
- Prior period transaction (how many periods?)
- Tax effect
- NCI impact (% of NCI) => only **upstream** transactions affect NCI (subsidiary sold to parent)

Example: Parent own 80%, NCI own 20%.

1) Intragroup dividend (parent %) => NCI dividend is to EXTERNAL parties (NOT intragroup)

<p><i>If dividend paid</i></p> <p>Dr Dividend revenue Cr Dividend expense</p> <p><i>If dividend declared</i></p> <p>Dr Dividend revenue Cr Dividend expense</p> <p>Dr Dividend payable Cr Dividend receivable</p>	<p>During current period, subsidiary <u>paid</u> a dividend of \$1000.</p> <p>Parent share = 80% x \$1000 = \$800</p> <p>Dr Dividend revenue \$800 Cr Dividend expense \$800</p> <p>NCI share = 20% x \$1000 = \$200 (NCI Step 3)</p> <p>Dr Dividend revenue \$200 Cr Dividend expense \$200</p>	<p>No effect on NCI</p> <p style="text-align: center;">NCI dividend's effect should be recorded in <u>NCI step 3</u></p>
---	--	--

2) Opening inventory: Inventory was transferred intragroup in previous periods and all are sold to external parties this period.

- + Decrease RE (debit): unrealised profit recorded by subsidiary last period is eliminated (% of inventory that remains in this period's beginning balance and have not been sold to external parties last period)
- + Decreases COS (credit): this period's COS recorded by subsidiary when beginning inventory is all sold to external parties is eliminated. From group's perspective, COS should NOT be recorded twice (intragroup sale and external sale).
- + Increase ITE (debit): COS decreases => this year's profit increases => income tax expense increases
- + Increase RE (credit): RE (unrealised profit last period) is eliminated => Decrease RE => Decrease Income tax expense last period => Increase RE

<p>Dr RE Cr COS</p> <p>Dr ITE Cr RE</p>	<p>E.g. During last period (period ended 30th June 2017), subsidiary sold \$4000 worth of inventory to parent for price of \$5000. 50% of this inventory is still on hand at beginning of current period (1st July 2018).</p> <p>Unrealised profit = 50% x (5000-4000) = \$500</p> <p>Dr RE \$500 Cr COS \$500</p> <p>Dr ITE \$150 Cr RE \$150</p>	<p>NCI effect: No change in total NCI Intragroup profit is unrealised last period but realised this period.</p> <p>+ Decrease in RE decreases NCI + Increase in NCI share of P/L increases NCI</p> <p>NCI share = 20% x (500 - 150)</p> <p>Dr NCI share of P/L Cr RE</p>
---	--	--

3) Closing inventory: Inventory is transferred intragroup during current period

- + Decrease in Sales (debit): the intragroup price received by subsidiary (seller) is not considered as sale revenue by the group (no external parties are involved) => From group perspective, this sale recorded by subsidiary must be eliminated

- + Decrease in COS expense (debit): Subsidiary (seller) records higher COS than what group records
- + Decrease in inventory CA (debit): Bring inventory down to the same CA as recorded by the group (initial CA)
- + Increase in DTA (debit): Inventory's CA decreases => FTA decreases (less future economic benefits to be taxed) => DTA increases
- + Decrease in ITE (credit): As (Sales – COS) decreases, this year's profit decreases (intragroup profit is unrealised). ITE thus decreases.

<p>Dr Sales (price paid intra-group) Cr COS Cr Inventory (unrealised profit)</p> <p>Dr DTA Cr ITE</p>	<p>E.g. In current period, subsidiary sold \$5000 worth of inventory to parent for a price of \$10000. 80% of this inventory have been sold to external parties during the current period (i.e. 20% of inventory left unsold) => \$5000 of intragroup profit = 80% x 5000 realised + 20% x 5000 unrealised => Total COS = 5000 + 80% x 5000 = 9000</p> <p>DR Sales \$10000 CR COS \$9000 CR Inventory (20% unsold) \$1000</p> <p>Dr DTA \$300 Cr ITE \$300</p>	<p>NCI effect: NCI decreases as this year's profit decreases</p> <p>NCI share = 20% x (1000-300)</p> <p>Dr NCI Cr NCI share of P/L</p>
---	--	--

4) Sale of PPE

- Depreciation expense is calculated based on initial CA at date of transfer (group perspective) and depreciate rate of the new party who now owns and uses the PPE
- As excess depreciation expense is eliminated, profit increases (unrealised profit of PPE intragroup sale we previously eliminated is gradually realised over the asset's useful life)
- **Indirect** involvement of external parties

- a) **Prior period sale** (how many periods?) -> 2 years and 6 months? (1.5 year RE, 1-year Dep exp)
- (RE – PPE) (DTA – RE) => decrease last year profit -> Decrease NCI (%)
 - Depreciation excess eliminated (Accumulated Dep – RE - Dep exp) (RE ITE – DTA) -> Increase last year profit & this year profit -> Increase NCI (%)

<p>Dr RE Cr PPE (unrealised profit) <i>(eliminate unrealised profit of PPE sale from last year's profit)</i></p> <p>Dr DTA Cr RE <i>(tax effects of unrealised profit of PPE sale)</i></p> <p>Dr Accumulated Depreciation Cr Depreciation Expense (current period's dep expense) Cr RE (prior periods' dep expense) <i>(Eliminate excess depreciation expense => Recognise realised profit)</i></p>	<p>On 1st October 2016, subsidiary sold a PPE to parent for a <u>profit of \$1000</u>. Parent uses the PPE and <u>depreciates it at rate of 20% p/a</u>. Record date: 30th June 2018</p> <ul style="list-style-type: none"> - As PPE is recorded by subsidiary at CA \$1000 higher than what is recorded by group, depreciation expense of subsidiary is recorded at 20% x \$1000 higher than recorded by group p/a. We need to eliminate this excess depreciation expense (credit dep expense) - Prior period's depreciation: 1st Oct 2016 – 30th June 2017 (10 months) = 20% x \$1000 x 9/12 = \$150 - Current period's depreciation: 30th June 2017 – 30th June 2018 (1 year) = 20% x \$1000 = \$200 - From 1st Oct 2016 – 30th June 2018, the total dep expense we need to eliminate is \$350. 	<p>NCI effect</p> <ul style="list-style-type: none"> • NCI decreases as PPE's unrealised profit is eliminated (decrease in last year's profit RE) Dr NCI Cr RE • NCI increases as excess depreciation is eliminated (increase in last year's and this year's profit) Dr NCI share of P/L Dr RE Cr NCI
--	--	---

Dr ITE
Dr RE
Cr DTA
(tax effects of excess depreciation elimination)

- As dep expense decreases, profit increases. Therefore, the 'unrealised profit' of \$1000 we previously eliminated is gradually recognised at 20% p.a. (at dep expense rate)

Dr RE \$1000
Cr PPE \$1000
(eliminate unrealised profit and bring PPE back to initial CA)

Dr DTA \$300 (PPE CA decreases => DTA increases)
Cr RE \$300 (last year's profit decreases => income tax exp of last period decreases)

Dr Accumulated Depreciation \$350
Cr Depreciation expense (1 year) \$200
Cr RE (9 months) \$150

Dr ITE \$60
Dr RE \$45
Cr DTA \$105
(Accumulated dep decreases => CA increases => FTA increases => DTA previously recorded decreases)