## Chsolutions assignment

## ASSIGN BUSTER

Bonds-? compare effective interest, straight-line 45 Bonds-? effective interest, straight-line (*W) 50 Bond interest 30 Bonds issued between interest dates (*W) 40 Bonds-? between interest dates: effective interest 40 Bonds issued between interest dates 35 upfront fees 25 Upfront fees and $n$ Toes papaya I e AS Borrowing costs 25 Retirement-? open market purchase 25 Bond retirement (W*) 30 Bond retirement 45 Bond retirement 20 Bond issuance and retirement, accrued interest 40 Bond issuance, defendants 40 Bonds, comprehensive 40 Foreign exchange 20 Foreign exchange (*W) 20 Partial statement to cash flow 30 W The solution to this assignment is on the text Web site and in the Study Guide. The solution is marked WEB.

Questions I_The definition off liability embodies a future sacrifice of assets or services, a present obligation, as a result off past transaction or event. 2. A financial liability exists when one company has a liability and another entity has a financial asset. Nan-financial liabilities are all Other liabilities; no corresponding financial asset arises on the books of the counter-party. Examples include liabilities for environmental remediation, lawsuits and warranties. [Other examples are acceptable. ] Liabilities must be probable of payment (350\% probability) to be recognized. Amounts are measured at best estimate, which is expected value for large populations and most likely outcome for small populations. Most likely outcome is informed by expected value and cumulative probabilities.

If suggested proposals for change are adopted, the liability will be measured at expected value as long as an obligating event takes place. 3. Accounting for the lawsuit is complicated at this stage because the company and/or the lawyer would be unwilling to admit in print (i. E. , in the financial tenements)
that they would settle the lawsuit, and at what amount. This might provide too much information to the plaintiff. Note disclosure of the lawsuit, in general terms, is the likely outcome, although an accrual for \$150, 000 would be made if the company were to share this information with its accountants, This is the ethically appropriate outcome. If the accrual is made, separate disclosure would be minimal so its treatment would not be obvious to the plaintiff 4.

A purchase order is an executors contract, and is not a liability until the other party performs its Obligations under the Contract. That is, the amount becomes a liability when the goods are delivered, but not until then. Some liability would be recognized if the contract became an onerous contact. This would happen if the fair value of the goods were to fall below $\$ 10$ per case. A liability would be recognized for the amount Of the loss because that amount has no economic value. 5 . No liability will be recorded for coupons that involve a modest decrease in purchase price. The only result of the coupon program is that gross profit will be lower in the period in which the coupons are used.

A liability would only be corded if the coupon program resulted in cash being paid out, or products sold at less than cost, Here, it is assumed that the \$14 regular price involves more than $\$ 1$ of gross profit. 6. The obligation under a self-insurance program is measured as the expected cash to be paid for losses that are filed but not yet settled, plus cash to be paid because of incidents that have taken place but where losses have not yet been discovered, The obligation cannot be inflated to also include expected events that have not yet happened, even if there is a statistical likelihood that such
vents will occur in the future. 7 _ The loan should be valued at its present value: $\$ 10,000$ (PIP, $10 \%, 2$ ) $\$ 8,265$. Short-term debt is normally not discounted, so would more likely be valued at $\$ 1 \mathrm{C}, \mathrm{CO}$.

The practice of not discounting current liabilities is justified on materiality grounds. 8. Par value (also known as the face value, principal or maturity value) is the principal amount paid on maturity. The (market) price Of the bond is the present value of cash flows (both principal and normal interest payments) discounted at the market interest rate on the issuance or valuation date. Par value and the market price will be identical when the stated (contractual) interest rate equals the market interest rate. The two values are different when the interest rates are different. If a $\$ 5,000$ bond is sold for 101 , the proceeds would be $\$ 5,050$ ( $\$ 5,000 \times 101 \%$. ) 9 .

The primary difference between straight-line and effective-interest amortization is the measurement of interest expense, under the straight-line method, an equal dollar amount of expense and amortization is recognized each period; under the effective-interest method, a constant rate (i. E. , the market interest rate on the day of issuance) is used to calculate interest. The expense is a function of the outstanding net liability; the dollar amount of interest expense and amortization recognized changes annually. The effective interest method is required practice because it provides a more accurate measure of the cost of borrowing. 10. The bond premium or discount is a contra account to the par value of the long-term liability, bonds payable, on the Statement Financial position, and either increases (premium) or decreases (discount) it accordingly.

The amortization Of the bond premium or discount is part Of interest expense, and either increases (discount) or decreases (premium) the expense to adjust the nominal rate to an approximation Of the effective rate. 11. A) The amount of accrued interest expense recognized at the end of the accounting period is the amount of interest that has accumulated (i. E., incurred and not yet paid) since the last interest payment. It will be paid on the next interest date. B) The amount of discount or premium amortization recognized is the amount that is required to reflect the yield rate in interest expense. Interest expense is not the cash paid after this adjustment.

It is related to time and the carrying amount of the bond, 12, Accrued interest must be recognized when bonds are sold (or purchased) between interest dates because the full molten of the cash interest as specified in the bond agreement is paid to the holder of the bond on each interest date regardless of the sale (or issue) date. The purchaser advances to the seller that portion of the periodic interest accrued (ii_, incurred) up to the date of sale. The net amount reflects the period the bond was actually outstanding. 13. The upfront administration fee would not be recognized as an expense when aid. Instead, it would factor into a calculation of the effective interest rate over the life Of the loan, Which would be higher than the stated interest rate Of 6\%. 4 Capitalization Of borrowing costs begins at the earliest Of the date when the money is borrowed, a payment is made on the asset, or work starts to make the asset ready for use. 15. The borrowing cost for general borrowings reflects the weighted average of loan sources, or $6.4 \%$ ((4\% x SO million) $4 \times \$ 8$ million)/SIS million total financing. ) 16. A gain or loss will occur on the repayment of a bond payable at any time hat the repayment
price is different than the net carrying value of the bond, including amortized premium or issuance costs, it any. 17. The bond discount or premium would be part of a bond retirement entry when the bond is retired prior to maturity, because the discount or premium would have a remaining balance to be eliminated.

The amount that is eliminated is the amortized balance, AAA defendants is a financial arrangement where the debtor irrevocably places investments in a trust fund for the sole purpose of using those resources to pay interest and principal On specified debt. The creditor agrees to this and legal release is given to the borrower. In an in-substance defendants, the transaction is the same except there is no legal release by the creditor _ Debt subject to a defendants arrangement is dereferencing, but debt subject to an insubstance defendants is left on the books. 19. Exchange loss: \$325, 000 (\$1. $08-\$ 1.16) \$ 26,000$. This is the change in the exchange rate during the year. 20, cash flow for interest is $99,000(\$ 45,500-\$ 4,500-\$ 2,000)$. Cases Case 12-1 Dry Clean Depot Limited Overview Dry Clean Depot Limited (DDCD) is a private company that has elected to comply tit APRS.

The company is reasonably small, with S) million in sales, and 40 retail locations. DDCD has just negotiated a new equipment loan, with covenants that specify a maximum 2-to-I debt-to-equity ratio. Other covenants require a minimum level of $\$ 500,000$ in cash, and restrict dividends to $\$ 100,000$ per year. These latter covenants require compliance, but are not affected by accounting policies. The debt-to-equity ratio restriction means that the company would prefer to maximize equity (earnings) and minimize debt.

Issues 1 Effective cost of loan 2. Capitalization of borrowing costs 3. Capital cost of equipment and depreciation 4. Lease arrangement 5.

Environmental obligation 6. Revenue recognition 7. Lease terms Analysis and conclusion 1. Effective cost of loan The effective interest rate for the $\$ 2,000$, 000 Ioan is determined by looking at the annual carrying Cost (590, 000 per year) and also the 5377, 000 upfront fee. When both are factored in, the effective interest rate is $7.2 \%$ : Effective interest rate $=$ Solve for x in, Zoos, oho $=\$ 377,000 \$ 90,000(P A, 10)+(P / F, x 5,10)$ Leptons fees are recorded as a discount and amortized to interest expense (etc. ) during the life of the Ioan. Since the discount is netted with the loan on the SEEP, this helps modestly reduce debt balances for covenant calculations.

The loan is specific to the equipment purchase, and interest must be capitalized during the acquisition period, which is lengthy. After the acquisition period, interest is an expense, If there were investment earnings on idle loan cash, for the period between the time that the loan money is advanced and amounts are paid out to suppliers, such earnings are netted in the interest capitalization calculation. General borrowing costs for the portion of the purchase price nuanced through DDCD cash flows are also be capitalized, but no imputed costs for equity. The borrowing cost must be calculated on a weighted average basis. Further information on each of these issues must be gathered. Interest to be capitalized: Loan balance x 7. \% x 10/12 \$120, 000 The ten month period consists POSIX months for production, three months for shipping plus one month for installation and testing. In terms of time line, the loan is assumed to be advanced and the equipment immediately ordered. If there is a time lag, the capitalization period will be

Ionger because capitalization ill start when the loan commences. Interest is capitalized when the loan monies are advanced, in the current fiscal period, Additional interest will be capitalized for amounts financed from general borrowings. This amount is not determinable but information must be gathered to calculate the adjustment, Interest capitalization will preserve levels of earnings (equity), making the debt- to-equity ratio easier to achieve.

Many Of the costs associated With equipment acquisition Will be capitalized, as follows: Description Amount Invoice price 52450, coo Interest cost (above) 120, 000 Interest on general borrowing Shipping 34, 000 Duty x 20\%) 490, 000 Installation \& testing 38, 000 Equipment is depreciated over its life using an acceptable depreciation method such as straight-line or declining balance. Policy for this must be set, along with a determination of the useful life and salvage value, or the declining balance rate. The equipment should be evaluated to see if components have various life spans; if so, then depreciation must be stratified to reflect this fact. 4. Lease Arrangement DDCD must evaluate the need to record a liability for the onerous contract that is presented by the lease situation in Sturdy.

The landlord has been informed that DDCD will vacate, and a sub-tenant located, with a signed contract for the sub-lease. This proves positive intent to act. DDCD has an obligation to pay $\$ 27,500$ for occupancy costs each year for the next three years, and has a sub-tenant that is willing to pay at least \$5,000 per year. Therefore, there is an unfunded obligation to $\$ 22$, 500 per year. This may be less if the extra sub-rent in years 2 and 3, 10\% of the sub-tenant sales in excess to $\$ 150,000$, can be reliably estimated.

However, since DDCD has had negative experience with this location, and the nature of the sub-tenant operation is unknown, no amount has been estimated in these calculations.

This area must be explored further, Since the payments take place over three years, the time value of money must be estimated to value the liability. Interest expense (accretion) will then be recorded each year. The interest rate to use should be a borrowing rate for operating activities over a three-year period. This rate is not known and must be established. A rate Of $7 \%$, based on the equipment loan (7. 2\%) has been used but this rate may not be comparable because term (10 years) and security are efferent. Losing the $7 \%$ rate, and assuming rent is payable at the beginning Of each year: Liability balance $\$ 22,500$ (P/AD, 3) (rounded) $\$ 63,000$ This amount will be recorded as a liability, worsening the debt-toequity ratio. It is not avoidable.

DDCD has a contractual liability in eight locations for environmental remediation in the event of contamination caused by dry cleaning operations, in particular, contamination caused by peer, These obligations must be estimated and discounted for the time value of money if payment is delayed. As for the onerous contract obligation, an interest rate of $\%$ will be used as an estimate but a more appropriate interest rate (term and security) must be estimated. The liability exists because DDCD stands ready to meet any potential costs. The major issue is measurement of the liability. If there is no contamination, then the liability has a zero value and there is no amount recorded.

This appears to be the case for most premises, and regular testing provides comfort that liabilities are identified on a timely basis. For one location, however, it appears as though there might be an environmental issue. Further testing is being done to confirm this, and the outcome of this jesting Will determine if remediation, and liability recognition, is needed. If action is needed, then the cost and the timing of action must be determined. The cost has been suggested in the $\$ 250,000$ to SASS, OHO range. Costs must be further explored, and an expected value established. If, for example, both of these estimates were equally likely, then the amount to be accrued would be \$375, 000.

Discounted for two years at this is a $\$ 325,000$ (rounded) liability. This amount is also capitalized as an asset, amortized over the remaining lease term. Note that additional liability recognition of a significant amount such as this, has active implications for the covenant agreement. Some covenant renegotiation might be considered, or perhaps additional equity financing might be possible. More importantly, the environmental obligations call the business model into question, and appropriate pricing and management of operational risks should be considered and evaluated at a strategic level. The cost of vacating premises at the end of the lease would also have to be identified and evaluated for recognition.

If DDCD has agreed to move after environmental cleanup, and this has costs, then the amount must be reflected in the financial statements. It may well be immaterial. DDCD sold prepaid dry cleaning services cards this year. When cards are issued, a liability for unearned revenue is created, and when the cards are used, the liability is decreased and revenue is recognized. This
is appropriate accounting. Card value of \$126, $000(\$ 468,000-\$ 342,000)$ is outstanding at wayfarer, or $27 \%$ of the gross cards issued, The issue that needs to be examined is how the initial $\$ 20$ price reduction is treated. A $\$ 120$ card costs $\$ 100$ for the customer, which is in essence a sales discount.

The amount must be relabeled as a sales discount, not an expense, and hon. as a contra account to sales. This is a presentation issue. Revenue should reflect cash value. This issue can be explained in one of two ways: I_ Services are being sold for a lower price, but this is not below cost (gross profit is usually 60\%); services are still profitable after the reduction granted with the cards. Valuation Of revenue and liability should be at the cash amount received not the regular price. Therefore, sales of the period should be $\$ 285,000(\$ 342,000 / 1.2)$, and the liability should be recorded at 5105, COO (\$1 26, 000/12). This increases net income (now has \$342, $000-\$ 78$, 000 recorded) and liabilities. Alternatively, valuation can be explained through the discount account. The discount amount, $\$ 78,000$ for the cards issued, has been entirely expensed in the current period. The question is whether this relates to this period, or whether the $\$ 78,000$ should be prorated consistent with card use. If it were prorated, the unused portion would reduce the reported liability. There is no need to establish a liability for more than the proceeds received. Accordingly, the sales discount should be recognized as it is used. The discount should be adjusted to \$57,000 $(578,000 \times 342 / 468)$ and the remaining S? I corded as a contra to the liability account, reducing it to \$105, 000 (\$126, $000-521,000$ ).

Either of these explanations is acceptable, DDCD expects that 5 to of the value on the cards will not be clues At the volumes sold this year, this
represents $\$ 23,400$ to $\$ 46,800$ of the liability (gross) outstanding at yearend or $\$ 1 \mathrm{~g}$, Soc to $\$ 39$, 000 When deflated to the lower cash amount. At year-end, this is approximately to $45 \%$ of the outstanding liability, Which is very high. The company has a legal obligation in perpetuity for these amounts, and must stand ready to honor the cards if they are used at any mint in the future. The company lacks history to use in determining any unused percentage. Accordingly, at this stage in the life of this program, it would not be advisable to decrease the liability for expected unused cards.

In terms of covenant implications, scaling back the liability and increasing earnings this year are both positive outcomes. It would be preferable to reduce the liability for unused cards, but if this cannot be measured, it certainly cannot be manipulated, 7. Lease arrangements DDCD is a tenant in forty locations, The leases have been described as short-term entails, over three to five years As such, they would almost certainly qualify as operating leases, and no liability for the leases would be recorded. DDCD should be aware, though, that the ASSAI is considering a proposal to capitalize all leases regardless of length of term. This would result in liability recognition for DDCD.

The loan contract just negotiated puts a limit on debt-to-equity over a tenyear time span, and capitalization might be required within this window. Therefore, DDCD should negotiate in advance with the lender around the scenario of an eventual capitalization, perhaps asking that such lease obligations be excluded room the ratio, or that the ratio be increased to reflect the alternate accounting rules. Conclusion Overall, liabilities have been established for environmental issues, onerous contracts, and
potentially for leases. If DDCD is now close to the debt covenant for debt-toequity, this Will be uncomfortable. It is still the inception of the loan contract. The company should look at projections for key financial variables and decide whether the loan covenant is reasonable.

If not, re-negotiation or alternate financing sources must be explored. Case 12-2 Dairy Limited Michel Leasers has requested that the financial statements of Dairy Limited, a many that manufactures equipment for the oil and gas industry, be reviewed for the purpose valuation_ Ethically, it is important to provide advice on a fair price to Mr.. Leasers without overstating or understating the company's situation; however, there is a natural bias to reduce earnings and assets given that Mr.. Leasers represents a group of purchasers and this is the beginning of negotiations. Since no one else is relying on this report, this bias is ethically acceptable.

The valuation formula is based on net tangible assets and earnings, so any adjustment that changes either Of these metrics Will change the purchase rice. Earnings must include only recurring items, assumed to repeat in the future. Ongoing items must be valued at the amount that would be expected to continue, and one-time items are not included in the valuation rule. 1. Financial health of Dairy Limited 2. Valuation to low-interest Ioan 3. Valuation of warranty expense and obligation 4. Goodwill write-up S. Valuation of capital assets 7 _ Valuation of allowance for doubtful accounts 8. Restatement of foreign currency accounts receivable _ Adjustments to earnings for non-recurring items now included I C. Calculation of bid ranges/ Conclusion.

