# Chapter 2

**Financial Statements and the Accounting System**

**Exercises**

**Exercise 2-1 (10 minutes)**

 **4 a. Prepare and analyze the trial balance.**

 **1 b. Analyze each transaction from source documents.**

 **2 c. Record relevant transactions in a journal.**

 **3 d. Post journal information to ledger accounts.**

**Exercise 2-2 (10 minutes)**

|  |  |  |  |
| --- | --- | --- | --- |
| **a.** | **5 “Three”** | **d.** | **1 “Asset”** |
| **b.** | **2 “Equity”** | **e.** | **3 “Account”** |
| **c.** | **4 “Liability”** |  |  |

**Exercise 2-3 (10 minutes)**

|  |  |  |  |
| --- | --- | --- | --- |
| **a.** | **1 “Chart”** |  |  |
| **b.** | **2 “General ledger”** |  |  |
| **c.** | **5 “Source document”** |  |  |
| **d.** | **4 “Account”** |  |  |
| **e.** | **3 “Journal”** |  |  |

**Exercise 2-4 (15 minutes)**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  |  | **Type of** | **Normal** | **Increase** |
|  | Account | **Account** | **Balance** | **(Dr. or Cr.)** |
| **a.** | **Land**  | **asset** | **debit** | **debit** |
| **b.** | **Cash**  | **asset** | **debit** | **debit** |
| **c.** | **Legal Expense**  | **expense** | **debit** | **debit** |
| **d.** | **Prepaid Insurance**  | **asset** | **debit** | **debit** |
| **e.** | **Accounts Receivable**  | **asset** | **debit** | **debit** |
| **f.** | **Dividends**  | **equity** | **debit** | **debit** |
| **g.** | **License Fee Revenue**  | **revenue** | **credit** | **credit** |
| **h.** | **Unearned Revenue**  | **liability** | **credit** | **credit** |
| **i.** | **Fees Earned**  | **revenue** | **credit** | **credit** |
| **j.** | **Equipment**  | **asset** | **debit** | **debit** |
| **k.** | **Notes Payable**  | **liability** | **credit** | **credit** |
| **l.** | **Common Stock**  | **equity** | **credit** | **credit** |

**Exercise 2-5 (15 minutes)**

**a. Analyze:**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Assets** | **=** | **Liabilities** | **+** | **Equity** |
|  **Cash Equipment** |  | **Note Payable** |  | **Revenue** |
|  **10,000 + 80,000** | **=** | **28,000** | **+** | **62,000** |

**b. Record:**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Date** | **Account Titles and Explanation** | **PR** | **Debit** | **Credit** |
| **May 15** | **Cash** | **101** | **10,000** |  |
|  | **Equipment** | **167** | **80,000** |  |
|  | **Note Payable** | **245** |  | **28,000** |
|  | **Revenue** | **404** |  | **62,000** |
|  |  ***Owner invests cash & equipment for stock.*** |  |  |  |

**c. Post**

|  |
| --- |
|  **Cash 101** |
|  **10,000** |  |

|  |
| --- |
| **Note Payable 245** |
|  |  **28,000** |

|  |
| --- |
|  **Equipment 167** |
|  **80,000** |  |

|  |
| --- |
|  **Revenue 404** |
|  |  **62,000** |

**Exercise 2-6 (15 minutes)**

|  |  |  |
| --- | --- | --- |
| **a.** | **Beginning accounts payable (credit)**  | **$152,000** |
|  | **Purchases on account in October (credits)**  | **281,000** |
|  | **Payments on accounts in October (debits)**  | **( ?)**  |
|  | **Ending accounts payable (credit)**  | **$132,500** |
|  |  |  |
|  | **Payments on accounts in October (debits)**  | **$300,500** |
|  |  |  |
| **b.** | **Beginning accounts receivable (debit)**  | **$102,500** |
|  | **Sales on account in October (debits)**  |  **?** |
|  | **Collections on account in October (credits)**  | **(102,890)** |
|  | **Ending accounts receivable (debit)**  | **$ 89,000** |
|  |  |  |
|  | **Sales on account in October (debits)**  | **$ 89,390** |
|  |  |  |
| **c.** | **Beginning cash balance (debit)**  | **$ ?**  |
|  | **Cash received in October (debits)**  | **102,500** |
|  | **Cash disbursed in October (credits)**  | **(103,150)** |
|  | **Ending cash balance (debit)**  | **$ 18,600** |
|  |  |  |
|  | **Beginning cash balance (debit)**  | **$ 19,250** |

**Exercise 2-7 (25 minutes)**

**Aug. 1Cash 6,500**

 **Photography Equipment 33,500**

 **Common Stock 40,000**

 **Owner invests in business for stock.**

 **2Prepaid Insurance 2,100**

 **Cash 2,100**

 **Acquired 2 years of insurance coverage.**

 **5Office Supplies 880**

 **Cash 880**

 **Purchased office supplies.**

 **20Cash 3,331**

 **Photography Fees Earned 3,331**

 **Collected photography fees.**

 **31 Utilities Expense 675**

 **Cash 675**

 **Paid for August utilities.**

**Exercise 2-8 (30 minutes)**

***Part 1***

|  |  |  |
| --- | --- | --- |
| Cash |  | Photography Equipment |
| **Aug. 1** | **6,500** |  |  **Aug. 2** | **2,100** |  | **Aug. 1** | **33,500** |  |  |
|  **20** | **3,331** |  | **5** | **880** |  |  |  |  |  |
|  |  |  | **31** | **675** |  | **Common Stock** |
| **Balance** | **6,176** |  |  |  |  |  |  | **Aug. 1** | **40,000** |
|  |  |  |  |  |  |  |  |  |  |
| **Office Supplies** |  | **Photography Fees Earned** |
| **Aug. 5** | **880** |  |  |  |  |  |  | **Aug. 20** | **3,331** |
|  |  |  |  |  |
| **Prepaid Insurance** |  | **Utilities Expense** |
| **Aug. 2** | **2,100** |  |  |  |  | **Aug. 31** | **675** |  |  |

***Part 2***

|  |
| --- |
| **Pose-for-pics** |
| **Trial Balance** |
| **August 31** |
|  |  ***Debit*** |  ***Credit*** |
| **Cash**  | **$ 6,176** |  |
| **Office supplies**  | **880** |  |
| **Prepaid insurance**  | **2,100** |  |
| **Photography equipment**  | **33,500** |  |
| **Common stock**  |  | **$40,000** |
| **Photography fees earned**  |  | **3,331** |
| **Utilities expense**  |  **675** | **\_\_\_\_\_\_**  |
| **Totals**  | **$43,331** | **$43,331** |

**Exercise 2-9 (30 minutes)**

**a. Cash 100,750**

 **Common Stock 100,750**

 **Owner invested in the business for stock.**

**b. Office Supplies 1,250**

 **Cash 1,250**

 **Purchased supplies with cash.**

**c. Office Equipment 10,050**

 **Accounts Payable 10,050**

 **Purchased office equipment on credit.**

**d. Cash 15,500**

 **Fees Earned 15,500**

 **Received cash from customer for services.**

**e. Accounts Payable 10,050**

 **Cash 10,050**

 **Made payment toward account payable.**

**f. Accounts Receivable 2,700**

 **Fees Earned 2,700**

 **Billed customer for services provided.**

**g. Rent Expense 1,225**

 **Cash 1,225**

 **Paid for this period’s rental charge.**

**h. Cash 1,125**

 **Accounts Receivable 1,125**

 **Received cash toward an account receivable.**

**i. Dividends 10,000**

 **Cash 10,000**

 **Paid cash dividends.**

**Exercise 2-9 (concluded)**

|  |  |  |
| --- | --- | --- |
| **Cash** |  | **Accounts Payable** |
| **(a)** | **100,750** |  | **(b)** | **1,250** |  | **(e)** | **10,050** | **(c)** | **10,050** |
| **(d)** | **15,500** |  | **(e)** | **10,050** |  |  |  | **Balance** | **0** |
| **(h)** | **1,125** |  | **(g)** | **1,225** |  |  |  |  |  |
|  |  |  | **(i)** | **10,000** |  |  |  |  |  |
| **Balance** | **94,850** |  |  |  |  | **Common Stock** |
|  |  |  |  |  |  |  |  | **(a)** |  **100,750** |
|  |  |  |  |  |  |  |  | **Balance** | **100,750** |
|  |  |  |  |  |  |  |  |  |  |
| **Accounts Receivable** |  | **Dividends** |
| **(f)** | **2,700** |  | **(h)** | **1,125** |  | **(i)** | **10,000** |  |  |
| **Balance** | **1,575** |  |  |  |  | **Balance** | **10,000** |  |  |
|  |  |  |  |  |  |  |  |  |  |
| **Office Supplies** |  | **Fees Earned** |
| **(b)** | **1,250** |  |  |  |  |  |  | **(d)** | **15,500** |
| **Balance** | **1,250** |  |  |  |  |  |  | **(f)** | **2,700** |
|  |  |  |  |  |  |  |  | **Balance** | **18,200** |
|  |  |  |  |  |  |  |  |  |  |
| **Office Equipment** |  | **Rent Expense** |
| **(c)** | **10,050** |  |  |  |  | **(g)** | **1,225** |  |  |
| **Balance** | **10,050** |  |  |  |  | **Balance** | **1,225** |  |  |

**Exercise 2-10 (15 minutes)**

|  |
| --- |
| SPADE COMPANY |
| **Trial Balance** |
| **May 31, 2018** |
|  |  ***Debit*** |  ***Credit*** |
| **Cash**  | **$ 94,850** |  |
| **Accounts receivable**  | **1,575** |  |
| **Office supplies**  | **1,250** |  |
| **Office equipment**  | **10,050** |  |
| **Accounts payable**  |  | **$ 0** |
| **Common stock**  |  | **100,750** |
| **Dividends**  | **10,000** |  |
| **Fees earned**  |  | **18,200** |
| **Rent expense**  |  **1,225** | **\_\_\_\_\_\_\_\_** |
| **Totals**  | **$118,950** | **$118,950** |

**Exercise 2-11 (20 minutes)**

**1.**

**a. Account Payable 2,000**

 **Cash 2,000**

**Paid amount owed toward account payable.**

**b. Salaries Expense 1,200**

 **Cash 1,200**

**Paid salary of receptionist.**

**c. Equipment 39,000**

 **Cash 39,000**

**Paid for equipment purchase.**

**d. Utilities Expense 800**

 **Cash 800**

**Paid utilities for the office.**

**e. Dividends 4,500**

 **Cash 4,500**

**Paid cash dividends.**

**2. Transactions a, c, and e did not record an expense for the following reasons:**

**e This transaction is a distribution of cash to the owner. Even though equity decreased, that decrease did not occur in the process of providing goods or services to customers.**

**a This transaction decreased cash in settlement of a previously existing liability (equity did not change). Supplies expense is recorded when assets are used, not necessarily when cash is paid.**

**c This transaction involves the purchase of an asset. The form of the company’s assets changed, but total assets did not (and neither did equity).**

**Exercise 2-12 (20 minutes)**

**1.**

**a. Cash 20,000**

 **Common Stock 20,000**

 **Cash received from owner investment for stock.**

**b. Cash 900**

 **Services Revenue 900**

 **Provided services for cash.**

**c. Cash 10,000**

 **Unearned Services Revenue 10,000**

 **Cash received for future services.**

**d. Cash 3,500**

 **Accounts Receivable 3,500**

 **Cash received toward accounts receivable.**

**e. Cash 5,000**

 **Note Payable 5,000**

 **Cash received for note payable to bank.**

**2. Transactions a, c, d, and e did not yield revenue for the following reasons:**

**d This transaction changed the form of an asset from receivable to cash. Total assets were not increased (revenue was recognized when the services were originally provided).**

**e This transaction brought in cash (increased assets), and it also increased a liability by the same amount (represented by the signing of a note to repay the amount).**

**a This transaction brought in cash, but this is an owner investment.**

**c This transaction brought in cash, and it created a liability to provide services to a client in the next year.**

**Exercise 2-13 (25 minutes)**

 **b 1. The company paid $4,800 cash in advance for prepaid insurance coverage.**

 **a 2. D. Belle created a new business and invested $6,000 cash, $7,600 of equipment, and $12,000 in web servers in exchange for stock.**

 **c 3. The company purchased $900 of supplies on account.**

 **e 4. The company received $4,500 cash for services provided.**

 **f 5. The company paid $900 cash towards accounts payable.**

 **g 6. The company paid $3,400 cash for equipment.**

 **d 7. The company paid $800 cash for selling expenses.**

Exercise 2-14 (30 minutes)

**a. Cash 6,000**

 **Equipment 7,600**

 **Web Servers 12,000**

 **Common Stock 25,600**

 **Owner investment in company for stock.**

**b. Prepaid Insurance 4,800**

 **Cash 4,800**

 **Purchased insurance coverage.**

**c. Supplies 900**

 **Accounts Payable 900**

 **Purchased supplies on credit.**

**d. Selling Expenses 800**

 **Cash 800**

 **Paid cash for selling expenses.**

**e. Cash 4,500**

 **Services Revenue 4,500**

 **Received cash for services provided.**

**f. Accounts Payable 900**

 **Cash 900**

 **Made payment on accounts payable.**

**g. Equipment 3,400**

 **Cash 3,400**

 ***Paid cash for equipment.***

**Exercise 2-15 (20 minutes)**

|  |
| --- |
| **Calculation of change in equity for *part* *a* through *part d*** |
|  | **Assets** | **-** | **Liabilities** | **=** | **Equity** |
| **Beginning of the year**  | **$ 60,000** | **-** | **$20,000** | **=** | **$40,000** |
| **End of the year**  | **105,000** | **-** | **36,000** | **=** |  **69,000** |
| **Net increase in equity**  |  |  |  |  | **$29,000** |

|  |  |
| --- | --- |
| **a. Net income**  | **$ ?** |
|  **Plus owner investments**  | **0** |
|  **Less dividends**  |  **(0)** |
|  **Change in equity**  | **$29,000** |
| **Net Income = $29,000** |

Since there were no additional investments or dividends, the net income for the year equals the net increase in equity.

|  |  |
| --- | --- |
| **b. Net income**  | **$ ?** |
|  **Plus owner investments**  | **0** |
|  **Less dividends ($1,250/mo. x 12 mo.)**  |  **(15,000)** |
|  **Change in equity**  | **$29,000** |
| **Net Income = $44,000** |

The dividends were added back because they reduced equity without reducing net income.

|  |  |
| --- | --- |
| **c. Net income**  | **$ ?** |
|  **Plus owner investment**  |  **55,000** |
|  **Less dividends**  |  **(0)** |
|  **Change in equity**  | **$29,000** |
| **Net Loss = $26,000** |

The investment was deducted because it increased equity without creating net income.

|  |  |
| --- | --- |
| **d. Net income**  | **$ ?** |
|  **Plus owner investment**  |  **35,000** |
|  **Less dividends ($1,250/mo. X 12 mo.)**  |  **(15,000)** |
|  **Change in equity**  | **$29,000** |
| **Net Income = $9,000** |

The dividends were added back because they reduced equity without reducing net income and the investments were deducted because they increased equity without creating net income.

**Exercise 2-16 (15 minutes)**

**HELP TODAY**

**Income Statement**

**For Month Ended August 31**

**Revenues**

 **Consulting fees earned $ 27,000**

**Expenses**

 **Rent expense $ 9,550**

 **Salaries expense 5,600**

 **Telephone expense 860**

 **Miscellaneous expenses 520**

 **Total expenses 16,530**

 **Net income $ 10,470**

**Exercise 2-17 (15 minutes)**

**HELP TODAY**

**Statement of Retained Earnings**

**For Month Ended August 31**

**Retained earnings, August 1 $ 0**

**Add: Net income (from Exercise 2-16) 10,470**

 **10,470**

**Less: Dividends 6,000**

 **Retained earnings, August 31 $ 4,470**

Exercise 2-18 (15 minutes)

**HELP TODAY**

**Balance Sheet**

**August 31**

 **Assets Liabilities**

**Cash $ 25,360 Accounts payable $ 10,500**

**Accounts receivable 22,360 Equity**

**Office supplies 5,250 Common stock 102,000**

**Office equipment 20,000 Retained earnings\* 4,470**

**Land 44,000 Total equity 106,470**

**Total assets $116,970 Total liabilities & equity $116,970**

**\* Amount from Exercise 2-17.**

Exercise 2-19 (15 minutes)

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  | **CBS** |  | **ABC** |  | **CNN** |  | **NBC** |
| **Answers**  | **$(28,000)** |  | **$42,000** |  | **$73,000** |  | **$(45,000)** |
| **Computations:** |  |  |  |  |  |  |  |
| **Equity, Dec. 31, Year 1**  | **$ 0** |  | **$ 0** |  | **$ 0** |  | **$ 0** |
| **Owner's investments**  | **110,000** |  | **42,000** |  | **87,000** |  | **210,000** |
| **Dividends**  | **(28,000)** |  | **(47,000)** |  | **(10,000)** |  | **(55,000)** |
| **Net income (loss)**  |  **22,000** |  |  **90,000** |  |  **(4,000)** |  |  **(45,000)** |
| **Equity, Dec. 31, Year 2**  | **$104,000** |  | **$85,000** |  | **$73,000** |  | **$110,000** |

**Exercise 2-20 (20 minutes)**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  | **Description** | **(1)Difference between Debit and Credit Columns** | **(2)****Column with the Larger Total** | **(3)****Identify account(s) incorrectly stated** | **(4)****Amount that account(s) is overstated or understated** |
| **a.** | **$3,600 debit to Rent Expense is posted as a $1,340 debit.** | **$2,260**  | **Credit** | Rent Expense | **Rent Expense is understated by $2,260** |
| **b.** | **$6,500 credit to Cash is posted twice as two credits to Cash.** | **$6,500** | **Credit** | Cash | **Cash is understated by $6,500** |
| **c.** | **$10,900 debit to the Dividends account is debited to Common Stock.** | **$0**  | **––** | **Common Stock****Dividends** | **Common Stock is understated by $10,900****Dividends is understated by $10,900** |
| **d.** | **$2,050 debit to Prepaid Insurance is posted as a debit to Insurance Expense.** | **$0**  | **––** | **Prepaid Insurance** **Insurance Expense** | **Prepaid Insurance is understated by $2,050** **Insurance Expense is overstated by $2,050** |
| **e.** | **$38,000 debit to Machinery is posted as a debit to Accounts Payable.** | **$0**  | **––** |  **Machinery** **Accounts Payable** | **Machinery is understated by $38,000 Accounts Payable is understated by $38,000** |
| **f.** | **$5,850 credit to Services Revenue is posted as a $585 credit.** | **$5,265**  | **Debit** | **Services Revenue** | **Services Revenue is understated by $5,265** |
| **g.** | **$1,390 debit to Store Supplies is not posted.** | **$1,390**  | **Credit** | **Store Supplies** | **Store Supplies is understated by $1,390** |

**Exercise 2-21 (15 minutes)**

|  |  |  |
| --- | --- | --- |
|  | **Overstated, Understated, or Correctly-Stated** | **Amount** |
| **a.** | **Correctly-stated. The debit column is correctly stated because the erroneous debit (to Accounts Payable) is deducted from an account with a (larger assumed) credit balance.** | **$0** |
| **b.** | **Understated. The credit column is understated by $37,900 because Accounts Payable was debited — it should have been credited.** | **$37,900** |
| **c.** | **Correctly-stated. The Automobiles account balance is correctly stated.** | **$0** |
| **d.** | **Understated. The Accounts Payable account balance is understated by $37,900. It should have been increased (credited) by $18,950 but the posting error decreased (debited) it by $18,950.** | **$37,900** |
| **e.** | **The credit column is $37,900 less than the debit column, or $162,100 in total ($200,000 - $37,900).** |  |

**Exercise 2-22 (15 minutes)**

|  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **a.** | **Co.** | **Liabilities** | **/** | **Assets** | **=** | **Debt****Ratio** |  | **Net****Income** | **/** | **Average****Assets** | **=** | **ROA** |
|  |  **1** | **$11,765** |  | **$ 90,500** |  | **0.13** |  | **$20,000** |  | **$100,000** |  | **0.200** |
|  |  **2** |  **46,720** |  |  **64,000** |  | **0.73** |  |  **3,800** |  |  **40,000** |  | **0.095** |
|  |  **3** |  **26,650** |  | **32,500** |  | **0.82** |  |  **650** |  | **50,000** |  | **0.013** |
|  |  **4** |  **55,860** |  | **147,000** |  | **0.38** |  | **21,000** |  | **200,000** |  | **0.105** |
|  |  **5** |  **31,280** |  | **92,000** |  | **0.34** |  | **7,520** |  | **40,000** |  | **0.188** |
|  |  **6** |  **52,250** |  | **104,500** |  | **0.50** |  |  **12,000** |  | **80,000** |  | **0.150** |

**b. Company 3 relies most heavily on creditor (non-owner) financing with 82% of its assets financed by liabilities.**

c. Company 1 relies least on creditor (non-owner) financing at only 13%. This implies that 87% of the assets are financed by equity (owners).

**d. The companies with the highest debt ratios indicate the greatest risk. The two companies with the highest debt ratios are 2 and 3.**

**e. Company 1 yields the highest return on assets at 20%; followed by Company 5 at 18.8%.**

**f. As an investor, one prefers high returns at low risk. Company 1 is the preferred investment since it yields the lowest risk (debt ratio is 13%) and highest return on assets (20%).**

**Exercise 2-23 (15 minutes)**

**Heineken N.V.**

**Balance Sheet (in Euro millions)**

**December 31, 2016**

**Assets Equity and liabilities**

**Noncurrent assets € 31,184 Total equity € 14,573**

**Current assets 8,137 Noncurrent liabilities 14,351**

 **Current liabilities 10,397**

**Total assets € 39,321 Total equity and liabilities € 39,321**

**Exercise 2-24 (25 minutes)**

**June 1Cash 11,000**

 **Common Stock 11,000**

 **Owner invests in business in exchange for stock.**

 **2Furniture 4,000**

 **Accounts Payable 4,000**

 **Purchased furniture on credit.**

 **3Prepaid Insurance 600**

 **Cash 600**

 **Paid premium in advance for insurance.**

 **4Accounts Receivable 3,000**

 **Fees Earned 3,000**

 **Billed customer for services provided.**

 **12Accounts Payable 4,000**

 **Cash 4,000**

 **Made payment toward account payable.**

 **20Cash 3,000**

 **Accounts Receivable 3,000**

 **Received cash toward account receivable.**

 **21Cash 10,000**

 **Common Stock 10,000**

 **Owners invest in business in exchange for stock.**

 **30 Cash 5,000**

 **Unearned Revenue 5,000**

 **Cash received in advance for future services.**