

	Hospital A	
	Year 1	Year 2
Current Assets	\$1,600,000	\$ 2,000,000
Property, Plant, & Equipment	6,000,000	7,500,000
Other Assets	400,000	500,000
Total Assets	\$8,000,000	\$10,000,000

Assignment Exercise 13–2: Trend Analysis

Refer to the Metropolis Health System (MHS) comparative financial statements at the back of the Examples and Exercises section.

Required

Perform trend analysis on the MHS statement of revenue and expenses.

Practice Exercise 13–III: Contractual Allowance

Assumptions:

1. Your unit's gross charges for the period to date amount to \$200,000.
2. The uniform gross charge for each procedure in your unit is \$100.00.
3. The unit receives revenue from four major payers. For purposes of this exercise, assume the revenue volume from each represents 25% of the total. (The equal proportion is unrealistic, but serves the purpose for this exercise.)
4. The following contractual payment arrangements are in effect for the current period. The percentage of the gross charge that is currently paid by each payer is as follows:
 Payer 1 = 90%
 Payer 2 = 80%
 Payer 3 = 70%
 Payer 4 = 50%

Q: How many procedures has your unit recorded for the period to date?

Q: Of these, how many procedures are attributed to each payer?

Q: How much is the net revenue per procedure for each payer, and how much is the contractual allowance per procedure for each payer?

Assignment Exercise 13–3

As a follow-up to the Practice Exercise above, new assumptions are as follows:

1. Your unit's gross charges for the period to date amount to \$200,000.
2. The uniform gross charge for each procedure in your unit is \$100.00.

3. The unit receives revenue from four major payers. The number of procedures performed for the period totals 2,000. Of that total, the number of procedures per payer (stated as a percentage) is as follows:
 Payer 1 = 30%
 Payer 2 = 40%
 Payer 3 = 20%
 Payer 4 = 10%
4. The following contractual payment arrangements are in effect for the current period. The percentage of the gross charge that is currently paid by each payer is as follows:
 Payer 1 = 80% [Medicare]
 Payer 2 = 70% [Commercial managed care plans]
 Payer 3 = 50% [Medicaid]
 Payer 4 = 90% [Self-pay]

Q: How many procedures are attributed to each payer?

Q: How much is the net revenue per procedure for each payer, and how much is the contractual allowance per procedure for each payer?

Q: How much is the total net revenue for each payer, and how much is the total contractual allowance for each payer?

Assignment Exercise 13–4.1: Forecast Capacity Levels

Review the information in Exhibit 13-1 “Capacity Level Checkpoints for an Outpatient Infusion Center.” The exhibit assumes three chairs and one 40-hour RN, for a realistic capacity level of seven patients infused per day.

Required

Prepare another Infusion Center Capacity Level Forecast as follows:

Assume the same three infusion chairs, but add another nurse for either four or six hours per day. How would this change the daily capacity level for number of patients infused per day?

Assignment Exercise 13–4.2

Required

Prepare another Infusion Center Capacity Level Forecast as follows:

Increase the number of infusion chairs to four, and add another nurse for either four or six hours per day. How would this change the daily capacity level for number of patients infused per day?

CHAPTER 14

Assignment Exercise 14–1: Comparable Data in a Graph

Review Figures 14-1 through 14-5. Each of the five figures presents a graph depicting some type of comparative data.

Required

Locate healthcare information that can reasonably be compared. (1) Prepare your comparative data. (2) Using your data, create one or more graphs similar to those found in Figures 14-1 through 14-5.

Assignment Exercise 14–2: Cumulative Inflation Factor for Comparable Data

Review Table 14-3 and the accompanying text.

Assumptions:

Two hospitals report their annual projected revenue for five years to the local newspaper for a story on the area's future economic outlook. However, Hospital 1 has applied a cumulative inflation factor of five percent per year while Hospital 2 has not applied any inflation factor. Thus the information is not properly comparable.

	Projected Revenue				
	Year 1	Year 2	Year 3	Year 4	Year 5
Hospital 1	\$20,000,000	\$22,500,000	\$27,500,000	\$27,500,000	\$30,000,000
Hospital 2	\$20,000,000	\$21,000,000	\$25,000,000	\$24,000,000	\$26,000,000

Required

Revise Hospital 2's projections by applying a cumulative inflation factor of five percent per year.

Assignment Exercise 14–3

The head of your department is a prominent researcher. A health research foundation has asked him travel to London to give an important speech at a conference. He will then travel to Paris to tour a research facility before returning home. Although his travel expenses are being funded by the foundation, he will still need to take along some personal money. Consequently, he asks you to figure the exchange rates for \$500 and for \$1,000 in both pounds and euros. He explains that he is trying to judge the spending power of U.S. dollars when converted to the other currencies so he can decide how much personal money to take on the trip.

Required

Locate the current exchange rates for pounds and euros and compute the currency conversion for \$500 and for \$1,000.

Assignment Exercise 14–4: The Discovery

The Chief Financial Officer at Sample Hospital has just discovered that the hospital's Chief of the Medical Staff's son Jason, a student at the local community college, is paid \$100 per week year round for grounds maintenance at the hospital's Outpatient Center.

The CFO, no fan of the Chief of Medical Staff, now wants you to prepare a report that compares the relative costs of lawn care at each of three locations; the hospital itself, the outpatient center, and the hospital-affiliated nursing home down the block.

Required

Review the available information for grounds maintenance at the three facilities. Decide how to convert this information into comparable data. Then prepare a report, based on your assumptions, that presents comparable costs of grounds care. Also provide your assessment of what the best future course of action should be.

Relevant Information

So far you have assembled the following information. Now you need to decide how it can be converted into comparable data.

Introduction to the Three Facilities

Sample Hospital is an older 100-bed hospital. The new Outpatient Center, built last year, is across the street and the Golden Age Nursing Facility is down one block, on the corner. All three facilities are part of the Metropolis Health System. (Appendix 25-A contains some financial details about Sample Hospital.) The hospital is located in the midwestern sunbelt; there is occasional frost in the winter but no snow.

Grounds Maintenance Tasks That Should Be Performed at All Three Sites

- Mowing and edging
- Walk sweeping
- Raking leaves
- Blowing off parking lot
- Flower bed maintenance (where necessary)
- Hedge trimming and minor tree pruning (major tree trimming is performed by a contractor on an as-needed basis and thus should be disregarded)

Figure Ex-1 provides a map that illustrates the layout of the grounds for each facility and their proximity to each other.

case.) The computation would thus be \$800,000 year 1 expense times the 1.05 inflation factor equals an inflation-adjusted year 1 expense figure of \$840,000.

However, if the CFO wants to apply an inflation factor to a whole series of years, he or she must account for the cumulative effect over time. An example appears in **Table 14-3**, entitled “Applying a Cumulative Inflation Factor.” We assume a base of \$500,000 and an annual inflation rate of 10 percent. The inflation factor for the first year is 10 percent, converted to 1.10, just as in the previous example, and \$500,000 multiplied by 1.10 equals \$550,000 in nominal dollars.

Beyond the first year, however, we must determine the cumulative inflation factor. For this purpose we turn to the Compound Interest Table. It shows “The Future Amount of \$1.00,” and appears in Appendix 12-B. “The Future Amount of \$1.00” table has years down the left side (vertical) and percentages across the top (horizontal). We find the 10 percent column and read down it for years one, two, three, and so on.

As shown in **Table 14-3.2**, the factor for year 2 is 1.210; for year 3 is 1.331, etc. We carry those factors to column C of **Table 14-3.1**. Now we multiply the \$500,000 in column B times the factor for each year to arrive at the cumulative inflated amount in column D. Thus \$500,000 times the year 2 factor of 1.210 equals \$605,000 and so on.

Table 14-3 Applying a Cumulative Inflation Factor

Table 14-3.1

SOURCE OF FACTOR IN COLUMN C ABOVE:
From the Compound Interest Look-Up Table
“The Future Amount of \$1.00” (Appendix 12-B)

Year	Factors as shown at 10%
1	1.100
2	1.210
3	1.331
4	1.464

Table 14-3.2

(A)	(B)	(C)	(D)
Year	Real Dollars	Cumulative Inflation Factor*	Nominal Dollars**
1	\$500,000	$(1.10)^1 = 1.100$	\$550,000
2	500,000	$(1.10)^2 = 1.210$	605,000
3	500,000	$(1.10)^3 = 1.331$	665,500
4	500,000	$(1.10)^4 = 1.464$	732,050

*Assume an annual inflation rate of 10%. Thus $1.00 + 0.10 =$ the 1.10 factor in Column C.

**Column D “Nominal Dollars” equals Column B times Column C.