CHAPTER 2
WORLDWIDE ACCOUNTING DIVERSITY

Chapter Outline

I. Considerable differences exist across countries in the accounting treatment of many items. These differences can result in significantly different amounts being reported in the financial statements prepared by companies using different GAAP.

II. A variety of factors influence a country's accounting system.
   A. Legal system – in code law countries, accounting rules tend to be legislated; common law countries tend to have a non-legislative organization that develops accounting standards.
   B. Taxation – financial statements serve as the basis for taxation in many countries. In those countries with a close linkage between accounting and taxation, accounting practice tends to be more conservative so as to reduce the amount of income subject to taxation.
   C. Providers of financing – in those countries in which family members, banks, and the government are the major providers of business finance, there tends to be less demand for public accountability and information disclosure. In countries where shareholders are a major provider of financing, the demand for information made available outside the company becomes greater.
   D. Inflation – countries with chronic high inflation adopt accounting principles in which traditional historical cost accounting is abandoned in favor of inflation adjusted figures.
   E. Political and economic ties – through previous colonization, a British style of accounting is used throughout most of the former British Empire. Ties between countries also help to explain similarities between the U.S. and Canada, and increasingly, the U.S. and Mexico.

III. Differences in accounting across countries cause several problems.
   A. Consolidating foreign subsidiaries requires that the financial statements prepared in accordance with foreign accounting rules must be converted into parent company GAAP.
   B. Companies interested in obtaining capital in foreign countries may be required to provide financial statements prepared in accordance with accounting rules in that country, which are likely to differ from rules in the home country.
   C. Investors interested in investing in foreign companies may have a difficult time in making comparisons across potential investments because of differences in accounting rules across countries.
   D. There is a lack of quality accounting standards in some parts of the world. The 1997 East Asian financial crisis was at least partially attributable to a lack of high quality accounting in the region.

IV. There are two major classes of accounting systems, the micro-based class and the macro-uniform class.
   A. The micro-based class of accounting is found in common law countries, where there is a separation of accounting from taxation, and shareholders are an important source of financing. Information is developed primarily for equity investors, with adequate disclosure serving as a major objective.

B. The macro-uniform class exists in code law countries, where accounting serves as the basis for taxation, and families, banks and government are the major providers of capital. Income measurement is more conservative and disclosure is lower than in the micro-based class of countries.

V. National culture is another factor long thought to influence a country's accounting system. Using Hofstede's (1980) societal value dimensions, Gray (1988) developed the following hypotheses:
   A. Conservatism hypothesis – countries high on uncertainty avoidance and long-term orientation and low on individualism and masculinity will foster a more conservative approach to measurement.
   B. Secrecy hypothesis – countries high in power distance, uncertainty avoidance, and long-term orientation and low on individualism and masculinity will exhibit more secrecy (less disclosures) in accounting reports.
   C. Research results provide some support for these hypotheses, especially the hypothesis that culture affects the level of disclosure in accounting reports.

VI. Nobes introduced a simplified model of the reasons for international differences in financial reporting in 1998. In this model, the class (A or B) of accounting used in a country is a function of the strength of the equity-outsider financing system, which is a function of a nation's culture, including its institutional structures.
   A. Class A accounting systems are oriented toward providing information to outside shareholders (less conservative, more disclosure). This is consistent with the micro-based class of accounting.
   B. Class B accounting systems are geared to taxation and creditors (more conservative, less disclosure, accounting follows tax rules).
   C. Nobes suggests that countries in Class B countries that are interested in competing for equity capital will adopt a Class A accounting system if allowed to do so.

VII. Differences in accounting across countries exist in several areas.
   A. Differences in the financial statements included in an annual report – for example, cash flows statements are not required in all countries.
   B. Differences in the format used to present financial statements – for example, assets are presented in order of liquidity in the U.S., but in reverse order of liquidity in most countries.
   C. Differences in the level of detail provided in the financial statements – for example, an Italian balance sheet can comprise up to five pages of the annual report.
   D. Terminology differences – for example, sales revenue in the U.K. is called "turnover," and inventory is called "stock."
   E. Disclosure differences – for example, companies in some countries provide extensive disclosures related to their employees.
   F. Recognition and measurement differences – for example, differences exist across countries with respect to the accounting for goodwill, development costs, and leases.

Answers to Questions

1. Companies in North America commonly present assets in order of liquidity, beginning with cash; companies in Europe commonly present assets in reverse order of liquidity, beginning with "fixed assets."

2. The two major types of legal system are "code law" and "common law." Code law countries tend to have an accounting law, which is rather general and does not provide much detail. In common law countries, a non-legislative organization generally develops accounting standards, which tend to provide much more detail than is found in the accounting laws of code law countries.

3. In those countries in which published financial statements form the basis for taxation, there is an incentive for companies to minimize financial statement income so as to also minimize income taxes. This incentive does not exist in those countries in which expenses taken for tax purposes are not required to be recognized in the financial statements.

4. The major providers of financing are equity investors (shareholders), banks, family members, and government. As equity financing becomes more important in a country so does the disclosure of information available to the public. It is not feasible for a company to allow hundreds and thousands of investors' access to internal accounting records.

5. Worldwide accounting diversity causes additional complexity for MNCs in the preparation of consolidated financial statements on the basis of parent company GAAP. Each foreign subsidiary must either keep two sets of books – one in local GAAP and one in parent company GAAP – or the foreign subsidiary's local GAAP financial statement must be reconciled to parent company GAAP. Accounting diversity also complicates MNCs gaining access to foreign capital markets, as investors and lenders in foreign countries might require financial statements prepared in local GAAP. A third problem for MNCs caused by worldwide accounting diversity relates to a lack of comparability of financial statements when making foreign acquisition decisions. The MNC might need financial statements for the potential acquisition target prepared in accordance with a set of accounting standards with which the MNCs managers are familiar and that fairly present operating performance and financial position.

6. Comparisons of companies across countries for making portfolio investment decisions are complicated by the diversity in accounting practice that exists worldwide. There is a so-called "apples and oranges" problem associated with trying to directly compare a company that uses one set of accounting standards to measure income and report financial position with another company that uses a different set of accounting standards.

7. Strong uncertainty avoidance countries are hypothesized to favor conservative measures of profit and assets following from a concern with security and a perceived need to adopt a cautious approach to cope with uncertainty of future events. They are also hypothesized to prefer secrecy (less disclosure) following from a need to restrict information so as to avoid conflict and competition and to preserve security.

8. The Anglo cultural area is expected to favor less conservatism and more disclosure and the Less developed Latin cultural area is expected to favor more conservatism and less disclosure.

9. Nobes (1998) argues that the two most important factors influencing differences in accounting systems across countries are (a) nature of culture and (b) type of financing system. Nobes' notion of culture appears to go beyond the rather narrow notion in Gray's framework to include institutional structures found in a country. Countries that are culturally dominated by a country with a self-sufficient culture are expected to have an accounting system similar to the dominant country. Some cultures lead to strong equity-outside shareholder financing systems, and other cultures lead to weak equity-outside shareholder financing systems. Countries with a strong equity-outside shareholder financing system use a Class A accounting system in which measurement practices are less conservative, disclosure is extensive, and accounting practice differs from tax rules. Countries with a weak equity-outside shareholder financing system use a Class B accounting system in which measurement is more conservative, disclosure is not as extensive, and accounting practice more closely follows tax rules.

10. Financial statements can differ across countries in terms of:
    a. which financial statements are included in an annual report;
    b. the format used to present individual financial statements;
    c. the level of detail provided in financial statements;
    d. terminology;
    e. disclosure requirements; and
    f. recognition and measurement rules.

11. Cost of goods sold is comprised of materials, labor, and overhead. In a type of expenditure format income statement, such as that presented by Südzucker AG in Exhibit 2.10, separate line items for *cost of materials*, *personnel expenses*, and *depreciation* are presented in the income statement. In addition, the line item *change in work in process and finished goods inventories* adjusts for the manufacturing costs included in *cost of materials*, *personnel expenses*, and *depreciation* that are not part of the cost of the inventory that was sold in the current year.

12. A statement of added value added presents information on the wealth created by the company and the distribution of this wealth to employees, banks, stockholders, and the government. Value added is calculated as income before deduction of the amounts distributed to employees (wages, salaries, pensions, etc.), banks (interest), and the government (taxes).

13. Fixed assets can be reported on the balance sheet subsequent to acquisition at:
    a. historical cost,
    b. historical cost adjusted for changes in the general purchasing power of the currency, and/or
    c. fair value.

Solutions to Exercises and Problems

1. a.

	Callaway	Sudzücker	Cemex	Sol Melia	Thai Airways
Gross profit margin					
Gross profit	343,763	N/A	58,129	N/A	N/A
Sales	950,799	5,718.2	197,801	1,148.7*	161,602,742,485***
	36.2%	N/A	29.4%	N/A	N/A
Operating profit margin					
Operating profit	(30,534)	392.4	15,840	105.2**	13,844,815,818
Sales	950,799	5,718.2	197,801	1,148.7	161,602,742,485
	(3.2%)	6.9%	8.0%	9.2%	8.6%
Net profit margin					
Net profit	(15,260)	276.4	1,649	43.5	7,415,827,014
Sales	950,799	5,718.2	197,801	1,148.7	161,602,742,485
	(1.6%)	4.8%	0.8%	3.8%	4.6%

* We use Total revenues.
** We assume that “EBIT” is an approximation of operating profit for Sol Melia.
*** We use Total Revenue from Sale or Revenues from Services.

Gross profit margin cannot be calculated for Sudzücker, Sol Melia, or Thai Airways because gross profit is not disclosed separately. These companies use a type of expenditure format income statement.

b. In addition to the usual caveat about comparing profit margins across companies operating in different industries, an analyst also must be careful in directly comparing profit margins across countries because of differences in the rules governing the recognition and measurement of revenues and expenses in calculating profit (income).

2. The solution to this exercise will depend upon the companies selected for examination. Instructors might want to forewarn students that depending upon the companies selected it might not be possible to identify five differences for parts c. and d.

3. The solution to this exercise will depend upon the companies selected for examination.

4. Gray's secrecy hypothesis – high secrecy = high PD, high UA, low IND, low MASC, high LTO

	PD	UA	IND	MASC	LTO	#
High Secrecy	***High***	***High***	***Low***	***Low***	***High***	
Belgium	**High**	**High**	High	High	Low	2
Brazil	**High**	**High**	Medium	High	**High**	3
Korea	**High**	**High**	**Low**	**Low**	**High**	5
Netherlands	Low	Medium	High	**Low**	**High**	2
Sweden	Low	Low	High	**Low**	Low	1
Thailand	**High**	Medium	**Low**	**Low**	High	3

Assuming that each cultural dimension is equally important in influencing the accounting value of secrecy, the number of dimensions on which each country's index is consistent with a high level of secrecy could be summed as shown in the far right column above. Using this approach, Korea would be expected to have the highest level of secrecy, followed by Brazil and Thailand, then Belgium and the Netherlands. Sweden would be rated as having the lowest level of secrecy.

Note that there could be some disagreement with respect to rating each country's level on each cultural dimension as high, medium, or low, but the overall conclusions should not be substantially different from those presented above.

5. Completing this assignment requires students to integrate the information in the chapter on factors affecting accounting development. There are no absolutely correct responses. Some of the factors that might be relevant are presented below:

Austria – Japan, Germany family – Germanic culture, influenced by Germany.

Brazil – Spain, Belgium, France, Italy family – former Portuguese colony, Latin cultural area – actually belongs in a separate Latin American family of accounting as shown in Exhibit 2.7.

Finland – Sweden family – Scandinavian culture, former Swedish possession, economic ties to Sweden.

Ivory Coast – Spain, Belgium, France, Italy family – former French colony – perhaps part of a Francophone African family of accounting comprised of former French colonies in Africa.

Russia – unclear as to where Russia would fit in – historically it would have been in a completely separate class of accounting based on the soviet system.

South Africa – U.K. influence family – former British colony – possibly with Netherlands, as South Africa was Dutch prior to becoming British.

6. The response to this exercise will depend upon the student's home country. U.S. students should mention (1) the importance of the equity market (strong equity-outside shareholder financing system), (2) the separation of taxation and financial reporting, and (3) the fact that accounting standards are developed by a non-governmental entity as important factors influencing accounting in the United States. Historical ties to the U.K. also could be mentioned.

7. There are no correct answers to these questions. Different opinions among students can generate an interesting debate.
   a. Possible answers include: lack of comparability of financial statements across countries, additional work for MNCs to prepare consolidated financial statements, lack of high quality financial reporting in some countries.
   b. Possible answers include: international investors, international lenders, MNCs.
   c. It might be easier for MNCs to deal with the problem of preparing worldwide consolidated financial statements than for international investors and creditors to deal with issues of non-comparability or low quality financial statements. The reason is that MNCs have the internal information needed to reconcile their foreign subsidiaries financial statements to a common GAAP, whereas investors and creditors generally do not have access to internal information to be able to make financial statements comparable or of higher quality.

8. There are no correct answers to these questions. Different opinions among students can generate an interesting debate.

   Two issues to consider are (1) how strong is the influence each factor exerts on accounting and (2) how likely is it that these factors will change over time. For example, if taxation exerts a very strong influence on financial reporting in some countries and it is highly unlikely that the governments in those countries will separate taxation from financial reporting, then taxation represents a relatively large impediment to convergence in those countries.

Case 2-1 The Impact of Culture on Conservatism

Part I.

If cultural values affect the development of financial reporting rules, and countries differ with respect to cultural values, then financial reporting rules will differ across countries. If financial reporting rules are strongly influenced by culture and cultural values do not change significantly over time, culture acts as an impediment to reducing differences in financial reporting rules that exist across countries.

Part II.

Even if all countries agreed to use the same financial reporting standards (harmonization), to the extent that application of those standards involves judgment, cultural differences could lead to differences in the application of those standards. For example, in applying a rule that requires recognition of a contingent loss when its realization is "probable," accountants in more highly conservative countries might err on the side of conservatism by establishing a lower probability threshold than would accountants in less conservative countries.

Other areas in which culture might lead to differences in the application of financial reporting rules include areas in which estimation and judgment are involved: warranty expense, bad debt expense, revenue recognition, asset impairment tests, obsolete inventories, etc.

Part III.

Cancan's internal auditors need to be aware that accountants in these different countries might have culturally-determined biases in the way that they apply the company's accounting policies. Accountants in Brazil and Korea are likely to be more conservative (higher UA, lower IND) in applying Cancan's accounting policies than the accountant in Sweden (lower UA, higher IND). The internal auditor needs to plan to conduct tests to determine whether this bias is operating. Contingencies, warranty expense, bad debt expense, revenue recognition, asset impairment tests, and obsolete inventories are all areas that require considerable judgment. In addition, the accountants in Brazil and Korea may be less willing to provide information requested by the internal auditors because of a higher level of secrecy.

Case 2-2 SKD Limited

1. ***Goodwill***
   a. There is no goodwill amortization expense in Country A, so the goodwill amortization expense recognized by SKD must be added back to determine income under Country A GAAP.
   SKD amortizes goodwill over a longer period (20 years) than is allowed in Country B (5 years), so an additional amount of goodwill amortization expense must be recognized to determine income under Country B GAAP, which reduces Country B GAAP income.
   b. The goodwill adjustment affects the retained earnings in stockholders' equity. The increase in Country A GAAP income results in an increase in retained earnings and the decrease in Country B GAAP income results in a decrease in retained earnings.
   c. The adjustment to income is for the current year only. The adjustment to stockholders' equity is cumulative. The fact that the stockholders' equity adjustment is three times as larger as the income adjustment implies that the goodwill was purchased three year ago.

2. ***Capitalized Interest***
   a. The adjustment labeled "Capitalized interest" relates to the interest that is not expensed but instead is capitalized under Country A GAAP. The adjustment labeled "Depreciation related to capitalized interest" relates to the depreciation of the interest that was capitalized as part of the cost of the asset.
   b. The first adjustment increases income because interest is not being expensed immediately but instead is capitalized as part of the cost of the asset to which it relates. The second adjustment decreases income because under Country A GAAP, the asset to which interest is capitalized has a larger cost and therefore a larger depreciation expense.
   c. Both income adjustments are closed out to retained earnings and partially offset one another. The increase to income of $50 and the decrease of $20 result in a net increase in retained earnings of $30.

3. ***Fixed Assets***
   a. When fixed assets are revalued to a higher amount, there is an increase in their carrying value with an offsetting increase in stockholders' equity to keep the balance sheet in balance. The amount by which the assets are revalued is subject to depreciation, which results in a larger depreciation expense. The adjustment to recognize this additional depreciation expense decreases income under Country B GAAP. It also decreases stockholders' equity (retained earnings). The decrease in retained earnings from additional depreciation is smaller than the increase in stockholders' equity from revaluation of assets, which results in a net increase in stockholders' equity. Note: if we knew when the fixed assets were revalued, we could determine the amount by which they were revalued. For example, if revaluation occurred at the end of the previous year, then the revaluation amount must have been $64 ($64 – 8 = $56) because only one year of additional deprecation would be included in the stockholders' equity adjustment.