### **SUGGESTED SOLUTIONS**

# **5.1 EXERCISE 1 CHAPTER 1.0**

A: RATIO ANALYSIS

RATIO					20X3	20X2
Gross profit margin	<u>103,500</u> 230,000	Х	<u>100</u> 1	=	45.0%	
	<u>65,000</u> 160,000	Х	<u>100</u> 1	=		40.6%
Markun	<u>103,500</u> 126,500	Х	<u>100</u> 1	=	81.8%	
Mark-up	<u>65,000</u> 95,000	Х	<u>100</u> 1	=		68.4%
Net	<u>21,000</u> 404,500	Х	<u>100</u> 1	=	5.2%	
profit margin	20,000 360,000	Х	<u>100</u> 1	=		5.6%
Inventory	<u>126,500</u> 50,000			=	2.5	
turnover	<u>95,000</u> 30,000			=		3.2
RATIO					20X3	20X2
Average collection	<u>35,000</u> 230,000	Х	365	=	55.5 days	
period (bar sales)	<u>15,000</u> 160,000	Х	365	=		34.2 days
Average collection	<u>36,000</u> 291,000	Х	365	=	45.2 days	
period (subscriptions)	25,000 285,000	Х	365	=		32 days
	Current assets				201,000	70,000
Working capital	Less current liabilities				120,000	140,000
	Working capital				81,000	(70,000)
Current	<u>201,000</u> 120,000			=	1.7:1	
ratio	<u>70,000</u> 140,000			=		0.5:1
Quick assets	<u>113,000</u> 85,000			=	1.3:1	
ratio less bank OD	<u>40,000</u> 60,000			=		0.7:1
Quick assets ratio	<u>113,000</u> 120,000			=	0.9:1	
(including bank OD)	<u>40,000</u> 140,000			=		0.3:1

RATIO					20X3	20X2
Expense Control						
Course	<u>286,000</u> 404,500	Х	<u>100</u> 1	=	70.9%	
maintenance	<u>264000</u> 360,000	Х	<u>100</u> 1	=		73.3%
Administration	80,000 404,500	Х	<u>100</u> 1	=	19.8%	
Auministration	70,000 360,000	Х	<u>100</u> 1	=		19.4%
Financial	<u>16,800</u> 404,500	Х	<u>100</u> 1	=	4.2%	
Fillancial	<u>6,000</u> 360,000	Х	<u>100</u> 1	=		1.7%
Interest cover	<u>37,800</u> 16,800				2.3	
Interest cover	<u>26,000</u> 6,000					4.3
Equity	<u>201,000</u> 501,000	Х	<u>100</u> 1	=	40.1%	
ratio	<u>70,000</u> 270,000	Х	<u>100</u> 1	=		25.9%
Liabilities	300,000 501,000	Х	<u>100</u> 1	=	59.9%	
to assets	200,000 270,000	Х	<u>100</u> 1	=		74.1%

ANALYSISgross margin went up, but the net profit margin went down from 20X2 to 20X3. A higher le of bar sales, assets and investment has failed to see any improvement in the club profitabilThe gross profit margins have been good, with an increase in the gross profit rate from 40. to 45.0% being an improvement in the last 12 months. Offsetting both these positives is a 1 increase in the expenses. Interest expenses are acceptable but course maintenance exper and administration have both increase.Most indicators of financial stability have improved. The level of accumulated funds has improved considerably from a very poor level of 25.9% in 20X2 to 40% in 20X3. This is large due to the \$110,000 injection of the members' contribution in 20X2. The ratio of liabilities to assets has also decreased from 74.1% to 59.9%.The extra capital injected has also caused a marked improvement in short-term solvency w both the liquidity ratio and current ratio well up on poor 20X2 levels. The quality of the cur assets is not as good as it could be – with a large amount in accounts receivable that is tall between 45 and 56 days to pay little actual cash, and a declining rate of stock turnover.Interest cover has also deteriorated, reflecting the fact that borrowing has increased with extra funds resulting in any improvement in overall profit.	
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times a year and increased inventory on hand. The age of debtors worsened slightly as well, with members' subscriptions and bar sales	Interest cover has also deteriorated, reflecting the fact that borrowing has increased without extra funds resulting in any improvement in overall profit.
	Stock turnover seems to be a problem area – with a stock decline from 3.2 times a year to 2.5 times a year and increased inventory on hand.

### C: POSSIBLE RECOMMENDATIONS FOR PROBLEM AREAS

#### **Poor stock turnover**

- Review sales patterns and cut back on purchasing slow-moving stock.
- Identify "dead" stock and discount prices to sell it.

#### High age of debtors

- Tighten credit criteria.
- Consider offering discount for prompt payment and charge interest for late payment.
- = Follow up on overdue debtors.

#### Low profitability

Identify the increase in course maintenance and administration costs and take appropriate steps to reduce the problem.

### **5.2 EXERCISE 2 CHAPTER 2.0**

### A: MANUKA DISTRICT INDOOR COMMUNITY SPORTS ARENA TRUST

#### 1

Separate membership classes and fee structure would likely be appropriate once the costs of running the fitness classes, gym, squash lessons and courts are known. This would stop cross-subsidisation and may stop the loss of members due to the increase in subscriptions for members who do not wish to do fitness classes or play squash, but just use the gym.

#### 2

The Arena Manager prepares the budget; therefore, the process is controlled by the manager and employees. There does not appear to be a review by the trust Board.

As the general expenses are nearly I6% of the expenditure, a breakdown of these costs should be provided to see if savings could be made.

More information is needed about the costs of running the fitness classes and any other costs for the squash lessons. The membership fees may be subsidising the fitness classes, which means small classes can be run even if they are not well supported.

#### 3

A review should be made of the number of fitness classes offered. What are the most popular and why? Try and copy that formula (e.g.) Is it the person taking the class? Get customer feedback) or cancel the least popular classes.

#### 4, 5, 6

As there has been a constant increase in the membership fees and most of the members use the gym, not the classes, there is a danger members may leave the club. This is because the fee increases are to cover the costs of the classes, which are only used by 40% of members – and infrequently.

#### 7

The club has a strategy of having the best gym equipment and fitness classes available. However, it appears the employees are running the arena for their own benefit.

A policy should be put in place about the purchase of the gym equipment by the Board, as it appears this is left to the staff. Some of the equipment is only being used for two years before being replaced – and likely has many years of use left. What is happening to the equipment that is being replaced? This is not appearing as a revenue item.

The amount spent on maintenance will likely be low due to the new equipment purchases. A cost benefit analysis should be completed for the costs of maintenance versus the replacement of equipment.

#### 8, 9

As the staff are well paid, wage decreases could be applied if this would not seriously affect the operation of the club. Or employees could be offered discounted use of facilities and classes, rather than free use.

Employees should be questioned about their use of the equipment during peak times (also used by members). Are they using the equipment during their hours of employment? If they are, a policy on acceptable times of use might be needed.

# **5.3 EXERCISE 3 CHAPTER 2.0**

A: MATARIRI GOLF CLUB MANAGEMENT REPORT FOR THE 12 MONTHS ENDED 30 JUNE 20X3

### **CURRENT MONTH**

	\$ ACTUAL	\$ BUDGET	\$ VARIANCE	% VARIANCE	
REVENUE					
Grants – Pub Charity	3,000	-	3,000	-	F
Grants – Eastern Trust	12,000	12,000	-	-	F
Member subscriptions	11,000	13,000	(2,000)	(15)	U
Golflessons	900	1,500	(600)	(40)	U
Corporate golf days	1,980	1,000	980	98	F
Club room hire weddings	-	500	(500)	(100)	U
Bar surplus	4,500	4,000	500	13	F
Total Revenue	33,380	32,000	1,380	(45%)	F
EXPENSES					
Audit fees	_	_	_		
Bad debts	500	-	(500)	-	U
Bank fees	30	25	(5)	(20)	U
Cleaning	750	700	(50)	(7)	U
Depreciation	2,500	2,500	-	-	F
Gift vouchers (prizes)	-	-	-		
Insurance	-	-	-	-	
Rubbish fees	900	700	(200)	(29)	U
Electricity	1,900	2,000	100	5	F
Printing	100	300	200	67	F
Computer expenses	600	300	(300)	(100)	U
Maintenance supplies (course)	10,500	600	(9,900)	(1650)	U
Maintenance (building)	900	300	(600)	(200)	U
Telephone/internet	190	200	10	5	F
Wages & salaries	18,500	18,000	(500)	(3)	U
Total Expenses	37,370	<b>2</b> 5, <b>625</b>	(11,745)	(1932)	
Budget surplus/(deficit)	(3,990)	6,375	13,125	1887%	

\$ ACTUAL	\$ BUDGET	\$ VARIANCE	% VARIANCE	
40,000	45,000	(5,000)	(11)	U
18,000	20,000	(2,000)	(10)	U
284,000	296,000	(12,000)	(4)	U
26,500	34,000	(7,500)	(22)	U
21,565	15,000	6,565	44	F
1,000	6,000	(5,000)	(83)	U
74,500	65,000	9,500	15	F
465,565	481,000	(15,435)	(72)	U
6,500	6,000	(500)	(8)	U
6,000	8,000	2,000	25	F
360	300	(60)	(20)	U
9,000	8,500	(500)	(6)	U
30,000	30,000	-	-	F
3,561	4,000	439		F
4,500	4,200	(300)	(7)	U
9,200	8,600	(600)	(7)	U
11,500	13,500	2,000	15	F
3,200	3,600	400	11	F
2,300	3,600	1,300	36	F
17,000	9,000	(8,000)	(89)	U
3,100	3,600	500	14	F
2,600	2,400	(200)	(8)	U
222,000	220,000	(2,000)	(I)	U
330,821	325,300	(5,521)	(35)	
134,744	155,700	(9,914)	(37)	

#### YEAR TO DATE

**B**:

While percentage variances can be large, dollar amounts can be relatively minor, and so not give cause for serious concern. However, we can also have small percentage variances, but significant dollar amounts – which should be reported on under most circumstances.

#### **Revenue variances:**

**Unfavourable:** Grants – Pub Charity and Eastern Trust, member subscriptions, golf lessons and club room hire.

Favourable: Corporate golf days and bar surplus.

#### **Expenses:**

Unfavourable: Maintenance supplies (course) and wages.

Favourable: Electricity.

### C. POSSIBLE REASONS FOR VARIANCES

#### Revenue

**Grants Pub Charity and Eastern Trust**: Total grants applied for not given. The manager has tried to replace this revenue by applying to other trusts for the funds. The club will report on the progress of these applications each month.

Member subscriptions: Member resignations; over-optimistic about club member growth.

**Golf lessons:** Golf pro away for a period of time with no replacement; over-optimistic about projection of lessons.

Corporate golf days: Two unexpected events, planned events more popular than expected.

**Bar surplus:** Corporate golf day extra events with free bar tab on two full playing fields meant increased bar sales.

#### **Expenses**

Maintenance supplies (course): Unexpected maintenance due to weather conditions; or incorrectly budgeted expense.

Advertising: Total budget not spent due to cancellation of a promotion.

Rubbish fees: Increased court hire to the public has led to increased rubbish to be disposed of.

**Wages:** Overtime was paid to the manager to cover for the bar staff in times of sickness or absences.

**Electricity:** Changing to a supplier that gave a free hour of electricity every week lowered the cost for the floodlights for night tennis.

# **5.4 EXERCISE 4 CHAPTER 3.0**

The individual subscription fees may be comparable to other clubs and therefore not a bargain, and other revenue sources will be needed as raising of subs is not a viable option.

If the subs are perceived by members and potential members as being value for money, it might lead to them staying or joining the organisation; however, a significant amount of revenue is needed to make up the shortfall to cover expenses.

If an organisation has secure, diverse sources of revenue, the low level of subscriptions might be acceptable to the organisation.

However, if the sources of revenue are contestable every year, or not reliable, then an unacceptable risk might have been introduced to the organisation by having such a low percentage of members' subs.

# **5.5** EXERCISE 5 CHAPTER 3.0

Creation of an emergency reserve fund should involve transferring or depositing cash to a separate bank account designated as an emergency or reserve fund account. At the same time a book entry is created which reflects this amount in Accumulated Funds as an Emergency Reserve Fund.

Unless the governance Board passes a resolution to the contrary, this fund can only be accessed in times of financial emergency. That is, the organisation needs extra funds to pay its accounts.

The problem with the Hei Hoi Indoor Bowling Club is that they are showing an emergency reserve of \$30,000 but have only \$8,652 in the bank account.

If at some point there was a physical \$30,000 that was set aside and used in an emergency, this has not been adjusted in Accumulated Funds as it is still showing.

The accounts are showing \$30,000 set aside as an emergency fund in Accumulated Reserves, but not reflected in the assets as cash.

## **5.6** EXERCISE 6 CHAPTER 3.0

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	\$
MOTEO CROQUET CLUB	BUDGET
REVENUE	
Subscriptions	48,000
Donations/grants	17,000
Lease of land	6,000
Total Revenue	71,000
EXPENSES	
Rates	13,000
Levies	900
Insurance	2,200
Audit	2,000
Croquet lawn care	49,000
Electricity	4,900
Club house expenses	1,400
Repairs & maintenance	2,600
Telephone	1,200
Total expenses	77,200
Deficit	(6,200)

One area for activity analysis is the lease of the 3ha to the organic squash grower. It was noted that the club's land was originally 2km from the outskirts of town. The rates for the property have increased as a result of rezoning. The lease of the 3ha is \$6,000, and if we deduct rates for 3ha of \$4,500 we have a profit of \$1,500.

The club subscriptions total \$48,000 and there are 240 members. Assuming they all pay the same subscription – this would be \$48,000/240 = \$200 each.

The subscription appears to be good value considering the facilities are named by Croquet Player magazine as the best in New Zealand. Also, the club members are relatively financially well off.

A simple sensitivity analysis might be conducted after putting a proposal to members explaining the financial position of the club. The proposal asked the members' opinion on various subscription increases.

SUBSCRIPTION	INCREASE	RESISTANCE
\$200	-	None
\$220	10%	None
\$240	20%	Little
\$260	30%	Minor
\$280	40%	Some
\$300	50%	Considerable
\$320	60%	Major

Based on the results, the club increased the subscriptions by 30%. (Club members may of course be able to afford a 60% subscription increase but wanting to pay it could be a different matter.)

The revised budget provides a surplus of \$8,200 as subs increased by 240 members x \$260 = \$62,400.

MOTEO CROQUET CLUB	\$ BUDGET
REVENUE	
Subscriptions	62,400
Donations/grants	17,000
Lease of land	6,000
Total Revenue	85,400
EXPENSES	
Rates	13,000
Levies	900
Insurance	2,200
Audit	2,000
Croquet lawn care	49,000
Electricity	4,900
Club house expenses	1,400
Repairs & maintenance	2,600
Telephone	1,200
Total expenses	77,200
Surplus	8,200

The 3ha of land, as calculated in (B), gives a net return of \$1,500 after the rates cost of \$4,500 is taken away from the \$6,000 lease income.

A land valuation reveals that this land is worth in excess of \$1 million. If the land is sold and invested at a low risk rate of 3%, this would return at least \$30,000 per year. The revised budget would be as follows:

MOTEO CROQUET CLUB	\$ BUDGET
REVENUE	
Subscriptions	62,400
Donations/grants	17,000
Lease of land	30,000
Total Revenue	109,400
EXPENSES	
Rates	8,500
Levies	900
Insurance	2,200
Audit	2,000
Croquet lawn care	49,000
Electricity	4,900
Club house expenses	1,400
Repairs & maintenance	2,600
Telephone	1,200
Total expenses	72,700
Surplus	36,700

Note that with land the rates would drop to \$8,500.

The surplus of \$36,700 can provide a cushion against the need to find donations/grants each year and allow for any assets or improvements the club wishes to make.

A comparison of last year's results to the proposed budget would show any movements in the expenses. All expenses seem reasonable for a club that size, but a further breakdown of the croquet lawn care expense might be required to see if any savings can be made.

What has been explored in this fictitious exercise is not uncommon in many sporting clubs. Some golf clubs, for instance, have sold off excess land or subdivided it as lower participation in the sport has meant they are asset rich, but cash flow poor.

Raising of subscriptions in clubs, even if members are in the higher income bracket, can still meet with resistance, especially if the perceived value of belonging at that cost is questioned.

Communication with members is therefore important to keep them informed.



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