Sample Telecommunications Business Model

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TELCOMMUNICATIONS BUSINESS MODEL
Lifestyle Trends Regulators New Entrants National/International Politics Customers Stockholders Suppliers Competitors Economy Technology Capital Markets
Strategic Management Process

Process Description	• Strategic management is the process of defining the vision of the company, formalizing it into a mission statement and converting the statement into objectives that identify market niches and products and services to be offered. The mission may be singular or multiple. The community served may be local, regional, national or international and may be different for each objective. The objectives will then be codified into a strategic plan for the company. The strategic plan is co-ordinated with shorter-term operating plans (operating budgets, capital budgets, etc.).		
Process Objectives	• Develop and communicate mission and vision • Determine strategic objectives (ie, profitability / market growth) • Identify and allocate resources necessary to execute business strategy • Manage performance • Measure business performance against strategic objectives • Promote culture of continuous change / improvement • Communicate values and behaviour		
Inputs	• Technology Trends • Competitive positioning • Market Needs, wants and trends	• Customer design concepts • Economic factors • Prior long-range plans	• Demographics • Global markets • Previous track record for success
Outputs	• Vision statement • Mission statement and long range plan • Information technology strategy	• Human resource needs • Investment strategy • Financial capital strategy	• R&D strategy • Organizational structure • Entity level communications needs and plan

Systems	• Executive information systems	• Competitor database	• Project management system
Classes of Transactions	Routine • None	Non-routine • Mergers & acquisitions • Non-routine investments • Executive compensation contracts • Divestitures	Accounting Estimates • Recover-ability of existing physical assets • Capital needs / requirements • Recover-ability of intangible assets

Risks Which Threaten Objectives	Controls Linked to Risks
• Poor communication of mission and vision • Poor operating capabilities / lack of appropriate resources	• Formal board approval of strategy and establishment of targets and objectives through the organization to support its delivery • Competitive bench-marking, customer surveys and performance evaluation
• Inadequate co-ordination between resource management and core business processes	• Regular board review of performance against strategic plan using balanced scorecard approach
• Missed opportunities / unforeseen threats (new competitors) / changing customer needs	• Monitoring and responding to external forces
• Lack of access to required capital and ability to service department	• Proper capital planning and management
• Loss of focus or inability to foster change	• Planned performance reviews, disciplined change management

Critical Success Factors (CSFs)	KPIs Linked to CSFs
• Creating and sustaining an appealing proposition to target customer / markets • Maximize stakeholder value • Successful change management • Effective capital management • Adequate resource management processes	• Market share; customer surveys • Share price; analyst ratings • Percent completion to scheduled improvement in affected process KPI • Return on equity; return on assets • Satisfaction surveys of internal customers

Other Symptoms of Poor Performance	• Unclear direction • Lack of employee involvement	• Undefined responsibilities • Consistent failure to introduce new products / line	• Weak market position • Poor financial results
Key issues and considerations for the tel-	• Impact of regulatory environment (eg ability to put through	• Move towards alliances (with both suppliers and	• Convergence of markets and technology (eg multimedia, software) • Broad or narrow strategic focus (e.g. be a pure network supplier or offer full range of telecom

communications industry	price changes, target different market segments) • Increasing liberalisation of global tel-communication markets • Need to be able to measure business performance by appropriate segments (e.g. ROCE, ROI varies significantly by business area	competitors), particularly on a global basis • Rapid pace of technological change impinges on ability to carry out effective long term strategic planning	services like https://www.megapath.com/voice/sip-trunking/)

CORE BUSINESS PROCESSES

core business process: customer care and billing

Process Description	The customer care and billing process covers the end-to-end process associated with (1) handling an initial customer order, (2) fulfilling that order, (3) generating a bill and (4) collecting cash for the service provided. It is also concerned with: • maintaining customer satisfaction to ensure they do not switch to another provider or cease service; and • providing different types of customer services It is important to view the above as one process rather than four separate processes, as inefficiencies or problems any where along the chain impacts the level of collection and customer satisfaction.
Process Objectives	• Meet specific needs and service levels required by new and existing customers • Attract and retain customers • Deliver tailored services through appropriate distribution channels • Meet management information requirements

- Prevent fraud and bad debts
- Deliver adequate structured billing data on expected media

Activities	• Record customer data and new customer order or order change request • Perform customer credit check • Issue service order for technical processing • Issue service change request • Enter billing data (eg master file details) • Process order forms from all sources (e.g. help-desk requests,	• Handling of inquiries from potential customers • Handling of inquiries from existing customers • Analyze and control customer churn rate • Perform customer retention measures	• Record internal/external problem statement • Issue trouble report • Analyze problems • Track and report trouble tickets • Remedy problems/process	• Collect call record data from internal/external networks • Classify, analyze and rate call data record • Produce subscriber, service provider and carrier bills • Process and control customer payment data • Issue invoice – both "one-off" (e.g. system sales) and regular volume sales	• Reconcile call data records to bills raised • Issue credits as appropriate

	system sales, routine volume /traffic driven sales) • Ensure order process triggers billing runs		
Systems	• Service order processing • Message processing • Automatic call distribution	• Billing system • Customer remittance processing	• Customer inquiry and error correction • Service provisioning system
Classes of Transactions	Routine • Service order processing (SO) • Access service requests (ASR) • Held order processing • Billing and collection • Cash application • Settlements • Billing adjustments (fraud, etc.) • Trouble ticket processing • Interconnection billing	Non-routine • System implementation and upgrades • Rating table changes (can also be a routine transaction) • Tariff structure changes • Settlement process changes • Service level changes	Accounting Estimates • Bad debt / credit adjustment reserve • Earned and unbilled revenue • Billed and unearned revenue • Accruals for interconnect billing

Risks Which Threaten Objectives
- Inadequate service level
- Improperly trained customer service representatives
- Delays in service and/or repair provisioning
- Provisioning errors
- Billing / cash processing errors
- Fraud
- Billing delays

Controls Linked to Risks
- Customer interviews
- Setting quality targets
- Monitoring performance targets
- Accountability and responsibility assignments
- Reconciliations
- Customer credit analysis
- Monitoring performance targets

Critical Success Factors (CSFs)
- Provide the following to stated performance levels with respect to cost timeliness and quality:

KPIs Linked to CSFs
- Span of time to activate the customer

• Service order processing	• Service order ageing • Held order levels and ageing
• Customer service level and quality	• Customer satisfaction • Churn rate
• Subscriber billing expectations	• Change requests concerning delivery of billing data
• Cash processing	• Days outstanding analysis • Trouble ticket ageing • Customer billing inquiry levels
• Installation and repairs expectations • Billing adjustments	• Customer and service profitability • Churn rates • Rate of bad debts / credit adjustment

Other Symptoms of Poor Performance	• Deterioration in service order, held order or trouble ticket ageings	• Undesired levels of customer churn	• Undesired levels of customer complaints, Billing adjustments, etc
Performance Improvement Opportunities	• Strategy consulting • Business process re-engineering	• Billing system evaluation and selection • Billing system implementation	• Revenue assurance • Controls assessment • Call center process consulting
Key issues and considerations for the tele-communications industry	• Fortelcos with a retail element to their business, the billing process is typically a ‘business critical’ function and maybe seen as a strategic asset. This is because a flexible and effective billing system is essential to maintaining competitiveness and may represent a competitive advantage (e.g. ability to offer	• A key issue facing most telcos is their ability to accurately and quickly process changes through their billing system (eg tariff updates or amendments to services provided). Delays lead to inaccurate billing and customer dissatisfaction.	• Revenue assurance function is critical due to the nature of the billing process (e.g. processing of call data records off a switch). • Depending on the products and markets served, there may be more than

	customers different pricing packages, cope with “Air miles” schemes). • Need to ensure that billing system is capable of supporting products and services promoted by sales/ marketing personnel (eg schemes promoted by sales functions are often not supported by the billing systems thereby requiring manual workarounds which are inefficient). • Order fulfilment differs significantly depending on service provided (e.g. mobile/cellular is relatively straightforward whilst frame relay or VPN service process will be more complex)	• Risk of customer billing commencing when paperwork has been processed instead of when service is activated (i.e. lost revenue) • Risk and significance of fraud is higher than most industries and therefore fraud detection/prevention controls are critical • Billing between operators (particularly internationally) may be done significantly in arrears (eg up to 6 months for some PTTs). • Need to ensure billing capabilities are able to cope with proposed changes in services/ products	one billing system. • Involvement of External Consultant IS specialists is usually required due to the automated and integrated nature of most billing systems (e.g. bills are raised from traffic data and not a sales order). • Strong controls need to be in place to ensure that when a customer is lost, the service is deactivated immediately • Need to ensure that billing system for “project work” (e.g. network build) captures all associated costs (e.g. labour, overhead, design costs)

Resource Management Processes

Resource Management process: financial / treasury management

Process Objectives	• Timely, accurate budgets and financial and regulatory reports • Relevant, timely and accurate information to management • Maximize cash flow / investment earnings • Provide low cost / reduced cycle time and increased accuracy for transaction processing activities • Optimize the entity's capital structure • Optimal tax structure to minimize overall taxes • Comply with financing agreements / covenants and minimize financing costs • Manage foreign currency and hedging transactions

Inputs	• Strategic Plan • Functional budgets • Process budgets	• Currency requirements • Financial resources • Debt/lease agreements	• Economic environment • Capital budgets • "Customer" • requirements • Market data

Activities

Outputs	• Budgets / forecasts • Internal reports • External financial reporting data	• Investment management data • Tax returns	• Capital resources • Capital disbursements
Systems	• Cash management • Tax compliance • Disbursement / payable	• Payroll • Investment management • Financial reporting	• General Ledger • Budgeting
Classes of Transactions	Routine • Cash receipts / disbursement	Non-routine • Equity offerings • Debt offerings • Refinancing arrangements	Accounting Estimates • Tax provision • Deferred taxes • Tax valuation allowance

- Unrealized foreign exchange gains / losses

Risks Which Threaten Objectives

- Inaccurate financial / management information
- Debt agreement / covenant violations
- Excessive exposure (interest, tax, counterparty, foreign currency)
- Mismatched investments / debts
- Excessive tax exposure / non-optimal structure
- Changes in market conditions
- External pressure to obtain results

Controls Linked to Risks

- Strong information systems; controls over reconciliations / suspense accounts, internal audit
- Periodic covenant analysis
- Exposure reviews with “expert” assistance
- Treasury management system; strong cash forecasting system
- Tax exposure review vs. external environment; “expert” assistance in tax structure review
- Infrastructure to track and react to market changes
- Review of accounting policies; audit committee oversight

Critical Success Factors (CSFs)

- Timely, relevant, accurate financial information
- Relationships with financing sources
- Efficient operations / qualified personnel
- Matching of cash requirements with forecasts
- Compliance with tax and loan regulations
- Foreign exchange currency exposure is managed

KPIs Linked to CSFs

- Cycle time for monthly close
- “Customer” satisfaction levels; information systems costs as % of sales; variances between initial close and final amounts; suspense account analysis
- Number/quality of financing sources
- Cost per vendor invoice processed
- Finance department headcount cost as % of respective tools
- Yield on investments/effective interest rate on borrowings
- Amendments to tax returns required / effective tax rate / default notices on covenants
- Foreign currency translation and transaction results

Other Symptoms of Poor Performance

- Capital shortages
- High debt / equity
- Lack of action following internal / external audit recommendations
- Inaccessible information
- Too many / few controls
- Reports done outside financial systems

	transaction costs • High effective tax rates	• Manual systems / workflow	• Decentralized sales / use tax administration
Performance Improvement Opportunities	• Change management • Performance measurement • Work process simplification • State tax minimization • Management reporting review • Internal audit review		• Activity-based management study • Electronic data interchange • Treasury review • Sales tax planning • Global reporting

PROCESS ANALYSIS TEMPLATE

A process analysis template is used throughout this business model to document the strategic management, core business and resource management processes. The following three pages explain the components of the template.

Process Analysis Template

Process Description	• The process description provides an overview of the entire process and provides focus for the process analysis.
Process Objectives	• The objectives of the process are statements that define the direction needing to be taken with respect to the process. Objectives often relate to items such as customer satisfaction, efficient use of resources and compliance with applicable regulations.
Inputs	• The inputs to a process represent the elements, materials, resources, or information needed to complete the activities in the process.
Activities	• The activities are those actions or sub processes that together produce the outputs of the process. For some processes, arrows are omitted due to the non sequential nature of the activities.
Outputs	• The outputs represent the end result of the process – the product, deliverables, information or resource that is produced.
Systems	• The systems are collections of resources designed to accomplish process objectives. Information systems produce reports containing operational, financial and compliance related information that make it possible to run and control the process.
Classes of Transactions	• The classes of transactions are data and information that are related to the process for use in one or more reports to management or third parties. The classes of transactions, which are broken down into routine and non-routine transactions and accounting estimates, provide a linkage from the process to the audit procedures.

Risks Which Threaten Objectives

- A process's risks are the risks which may threaten the attainment of the process's objectives.

Controls Linked to Risks

- Controls are the policies and procedures, which may or may not be put in place, that help provide assurance that the risks are reduced to a level acceptable to meet the process's objectives.

Critical Success Factors (CSFs)

Critical success factors (CSFs) are the prerequisites and areas of dependency for a process to be successful. CSFs may be inputs, parallel or supporting activities or aspects of a business's philosophy or infrastructure necessary to ensure the proper delivery of the process.

KPIs Linked to CSFs

Key performance indicators (KPIs) are the quantitative measurements, both financial and non-financial, of the process's ability to meet its objectives through trend analyses within a company or bench-marking against a peer of the company or its industry. The KPIs listed are not all of the KPIs that exist relative to each process, but rather are examples that the company may or may not measure. While most KPIs can be linked to CSFs, this may not always be the case.

Other Symptoms of Poor Performance

Other symptoms of poor performance represent other evidence which may exist that indicates the process may not be operating to its most effective level. The items listed here should lead to performance improvement opportunities listed below.

Performance Improvement Opportunities

Performance improvement opportunities are areas for performance or process improvement. This improvement may be achieved internally by the client or through External Consultant or other third-party assistance.

Key issues and considerations for the telecommunication industry

For each core business process, common key issues and considerations specific to the telcommunications industry have been highlighted to assist audit teams in identifying potential issues that need to be monitored and followed up during the course of their audit. It should benoted that the issues identified are not intended to be an exhaustive list of all telecommunication issues that may exist for that process and audit staff must use their judgement in determining what issues are applicable to their clients.

ENTITY-LEVEL BUSINESS MODEL

Entity–Level Business Model

As shown on the next page, the entity–level business model is used to describe the interlinking activities carried out within a business entity, the external forces that bear upon the entity, and the business relationships with persons outside the entity. The items included in the entity–level business model include the following components:

- External forces and agents are those factors, pressures and forces from outside the entity that often are threats to the attainment of the entity's objectives.
- Markets/formats are the segments of an industry that are applicable to the entity. Formats identify the design and location of the facilities.
- The strategic management process is the process that:
    - develops the entity's mission;
    - defines the entity's business objectives;
    - identifies the business risks that threaten attainment of the business objectives;
    - manages the business risks by establishing business processes; and
    - monitors progress toward meeting the business objectives.
- Core business processes are the processes that develop, produce, sell and distribute an entity's products and services. These processes do not follow traditional organizational or functional lines, but reflect the grouping of related business activities.
- Resource management processes are business processes that provide appropriate resources to the other business processes.
- Alliances are established by an entity to attain business objectives;
    - expand business opportunities; and
    - reduce or transfer business risk.
- Core products and services are the entity's products and services.
- Customers involve relationships that are usually the entity's primary focus.

Core Business Processes

Strategic Management Process

Direct Sales, Agents, Company-owned, Stores, Telemarketers, Resellers, Bills/Bill Inserts, Direct Mail, Debit Cards, Advertising, Cellular, PCS, Cable, Long Distance, CLEC, ILEC, Energy Companies (Electric utilities, Gas utilities), Railroads, Content Providers, Vendors, Equipment Mfrs., International

Resource Management Processes

Financial / Treasury Management, Legal & Regulatory Management, Information Management, Channels' Alliances' Core Products/ Services, Customers (Domestic & Int'l), Human Resources, Developing new services & products, Managing & operating the network

EXTERNAL FORCES & AGENTS

TELCOMMUNICATIONS BUSINESS MODEL

Lifestye, Trends, Regulators, New Entrants, National/International, Politics, Customers, Stockholders, Suppliers, Competitors, Economy, Technology, Capital Markets,

Strategic Management Process

Process Description

- Strategic management is the process of defining the vision of the company, formalizing it into a mission statement and converting the statement into objectives that identify market niches and products and services to be offered. The mission may be singular or multiple. The community served may be local, regional, national or international and may be different for each objective. The objectives will then be codified into a strategic plan for the company. The strategic plan is co-ordinated with shorter-term operating plans (operating budgets, capital budgets, etc.).

Process Objectives

- Develop and communicate mission and vision
- Determine strategic objectives (i.e. profitability / market growth)
- Identify and allocate resources necessary to execute business strategy
- Manage performance
- Measure business performance against strategic objectives
- Promote culture of continuous change / improvement
- Communicate values and behaviour

Inputs

- Technology Trends
- Competitive positioning
- Market Needs, wants and trends
- Customer design concepts
- Economic factors
- Prior long-range plans
- Demographics
- Global markets
- Previous track record for success

- Determine communications and message Identify resource needs
- Identify and prioritize consumer needs and products
- Develop mission statement and long-range plan
- Determine vision statement
  - Adjust where appropriate
- Determine measurements and monitor performance
  - Assemble model and economic research
  - Activities

Outputs

- Vision statement
- Mission statement and long range plan
- Information technology strategy
- Human resource needs
- Investment strategy
- Financial capital strategy
- R&D strategy
- Organizational structure
- Entity level communications needs and plan

Systems	• Executive information systems	• Competitor database	• Project management system
Classes of Transactions	Routine • None	Non-routine • Mergers & acquisitions • Non-routine investments • Executive compensation contracts • Divestitures	Accounting Estimates • Recover-ability of existing physical assets • Capital needs / requirements • Recover-ability of intangible assets

Risks Which Threaten Objectives	Controls Linked to Risks
• Poor communication of mission and vision • Poor operating capabilities / lack of appropriate resources	• Formal board approval of strategy and establishment of targets and objectives through the organization to support its delivery • Competitive bench-marking, customer surveys and performance evaluation
• Inadequate co-ordination between resource management and core business processes	• Regular board review of performance against strategic plan using balanced scorecard approach
• Missed opportunities / unforeseen threats (new competitors) / changing customer needs	• Monitoring and responding to external forces
• Lack of access to required capital and ability to service department	• Proper capital planning and management
• Loss of focus or inability to foster change	• Planned performance reviews, disciplined change management

Critical Success Factors (CSFs)	KPIs Linked to CSFs
• Creating and sustaining an appealing proposition to target customer / markets	• Market share; customer surveys
• Maximize stakeholder value	• Share price; analyst ratings
• Successful change management	• Percent completion to scheduled improvement in affected process KPIs
• Effective capital management	• Return on equity; return on assets
• Adequate resource management processes	• Satisfaction surveys of internal customers

Other Symptoms of Poor Performance	• Unclear direction • Lack of employee involvement	• Undefined responsibilities • Consistent failure to introduce new products / line	• Weak market position • Poor financial results
Performance Improvement Opportunities	• More rigorous planning and communication • Visioning or needs assessment analyses	• Introduce performance management systems • Balanced score card • EVA	• Merger and acquisition assistance • More detailed market and competitor research to identify improvement opportunities
Key issues and considerations for the tel-communications industry	• Impact of regulatory environment (e.g. ability to put through price changes, target different market segments) • Increasing liberalization of global tel-communication markets • Need to be able to measure business performance by appropriate segments (e.g. ROCE, ROI varies significantly by business area)	• Move towards alliances (with both suppliers and competitors), particularly on a global basis • Rapid pace of technological change impinges on ability to carry out effective long term strategic planning	• Convergence of markets and technology (e.g. multimedia, software) • Broad or narrow strategic focus (e.g. be a pure network supplier or offer full range of telecom services)

TELCO CORE BUSINESS PROCESSES

Core business process: Customer care and billing

Process Description	• The customer care and billing process covers the end-to-end process associated with (1) handling an initial customer order, (2) fulfilling that order, (3) generating a bill and (4) collecting cash for the service provided. It is also concerned with: • maintaining customer satisfaction to ensure they do not switch to another provider or cease service; and • providing different types of customer services It is important to view the above as one process rather than four separate processes, as inefficiencies or problems any where along the chain impacts the level of collection and customer satisfaction.
Process Objectives	• Meet specific needs and service levels required by new and existing customers • Attract and retain customers • Deliver tailored services through appropriate distribution channels • Meet management information requirements • Prevent fraud and bad debts • Deliver adequate structured billing data on expected media

Activities

• Record customer data and new customer order or order change request • Perform customer credit check • Issue service order for technical processing • Issue service change request • Enter billing data (eg masterfile details) • Process order forms from all sources (eg helpdesk requests, system sales,	• Handling of inquiries from potential customers • Handling of inquiries rom existing customers • Analyze and control customer churn rate • Perform customer retention measure	• Record internal/external problem statement • Issue trouble report • Analyze problems • Track and report trouble tickets • Remedy problems/ process	• Collect call record data from internal/external networks • Classify, analyze and rate call data record • Produce subscriber, service provider and carrier bills • Process and control	• Reconcile call data records to bills raised • Issue credits as appropriate

	routine volume/traffic driven sales) • Ensure order process triggers billing runs		customer payment data • Issue invoice – both "one-off" (eg system sales) and regular volume sales
Systems	• Service order processing • Message processing • Automatic call distribution	• Billing system • Customer remittance processing	• Customer inquiry and error correction • Service provisioning system
Classes of Tansactions	Routine • Service order processing (SO) • Access service requests (ASR) • Held order processing • Billing and collection • Cash application • Settlements • Billing adjustments (fraud, etc.) • Trouble ticket processing • Interconnection billing	Non-routine • System implementation and upgrades • Rating table changes (can also be a routine transaction) • Tariff structure changes • Settlement process changes • Service level changes	Accounting Estimates • Bad debt / credit adjustment reserve • Earned and unbilled revenue • Billed and unearned revenue • Accruals for interconnect billing

Risks Which Threaten Objectives

- Inadequate service level

Controls Linked to Risks

- Customerinterviews

- Improperly trained customer service representatives
- Delays in service and/or repair provisioning
- Provisioning errors
- Billing / cash processing errors
- Fraud
- Billing delays

- Setting quality targets
- Monitoring performance targets
- Accountability and responsibility assignments
- Reconciliations
- Customer credit analysis
- Monitoring performance targets

Critical Success Factors (CSFs)

- Provide the following to stated performance levels with respect to cost timeliness and quality:
- Service order processing
- Customer service level and quality
- Subscriber billing expectations
- Cash processing
- Installation and repairs expectations
- Billing adjustments

KPIs Linked to CSFs

- Span of time to activate the customer
- Service order ageing
- Held order levels and ageing
- Customer satisfaction Churn rate
- Change requests concerning delivery of billing data
- Days outstanding analysis
- Trouble ticket ageing
- Customer billing inquiry levels
- Customer and service profitability
- Churn rates
- Rate of bad debts / credit adjustment

Other Symptoms of Poor Performance

- Deterioration in service order, held order or trouble ticket ageings
- Undesired levels of customer churn
- Undesired levels of customer complaints, billing adjustments,

Performance Improvement Opportunities

- Strategy consulting
- Business process re-engineering
- Billing system evaluation and selection
- Billing system implementation
- Revenue assurance
- Controls assessment
- Call center process consulting

Key issues and considerations for the tele-communications industry

- For telcos with a retail element to their business, the billing process is
- A key issue facing most telcos is their ability to accurately and quickly process changes through their billing system (eg tariff updates or amendments
- Revenue assurance function is critical due to the nature of the billing

typically a ‘business critical’ function and may be seen as a strategic asset. This is because a flexible and effective billing system is essential to maintaining competitiveness and may represent a competitive advantage (eg ability to offer customers different pricing packages, cope with “Air miles” schemes). • Need to ensure that billing system is capable of supporting products and services promoted by sales/marketing personnel (eg schemes promoted by sales functions are often not supported by the billing systems thereby requiring manual	to services provided). Delays lead to inaccurate billing and customer dissatisfaction • Risk of customer billing commencing when paperwork has been processed instead of when service is activated (ie lost revenue) • Risk and significance of fraud is higher than most industries and therefore fraud detection/ prevention controls are critical • Billing between operators (particularly internationally) may be done significantly in arrears (eg up to 6 months for some PTTs). • Need to ensure billing capabilities are able to cope with proposed changes in services/ products	process (eg processing of call data records off a switch). • Depending on the products and markets served, there may be more than one billing system. • Involvement of External Consultant IS specialists is usually required due to the automated and integrated nature of most billing systems (eg bills are raised from traffic data and not a sales order). • Strong controls need to be in place to ensure that when a customer

	workarounds which are inefficient). • Order fulfilment differs significantly depending on service provided (eg mobile/ cellular is relatively straightforward whilst frame relay or VPN service process will be more complex)		is lost, the service is deactivated immediately • Need to ensure that billing system for “project work” (eg network build) captures all associated costs (e.g. labour, overhead, design costs)

RESOURCE MANAGEMENT PROCESSES

Resource Management Process: Financial / Treasury Management

Inputs	• Strategic Plan • Functional budgets • Process budgets	• Currency requirements • Financial resources • Debt/lease agreements	• Economic environment • Capital budgets • “Customer” requirements • Market data

Activities

Outputs	• Budgets /forecasts • Internal reports • External financial reporting data	• Investment management data • Tax returns	• Capital resources • Capital disbursements
Systems	• Cash management	• Payroll • Investment management	• General ledger

	• Tax compliance • Disbursement / payable	• Financial reporting	• Budgeting
Classes of Transactions	Routine • Cash receipts / disbursement	Non-routine • • Equity offerings • Debt offerings • Refinancing arrangements	Accounting Estimates • Tax provision • Deferred taxes • Tax valuation allowance • Unrealized foreign exchange gains / losses

Risks Which Threaten Objectives

- Inaccurate financial / management information
- Debt agreement / covenant violation
- Excessive exposure (interest, tax, counter party, foreign currency)
- Mismatched investments / debts
- Excessive tax exposure / non-optimal structure
- Changes in market conditions
- External pressure to obtain results

Controls Linked to Risks

- Strong information systems; controls over reconciliations / suspense accounts, internal audit
- Periodic covenant analysis
- Exposure reviews with “expert” assistance
- Treasury management system; strong cash forecasting system
- Tax exposure review vs. external environment; “expert” assistance in tax structure review
- Infrastructure to track and react to market changes
- Review of accounting policies; audit committee oversight

Critical Success Factors (CSFs)

- Timely, relevant, accurate financial information
- Relationships with financing sources
- Efficient operations / qualified personnel
- Matching of cash requirements with forecasts
- Compliance with tax and loan regulations
- Foreign exchange currency exposure is managed

KPIs Linked to CSFs

- Cycle time for monthly close
- “Customer” satisfaction levels; information systems costs as % of sales; variances between initial close and final amounts; suspense account analysis
- Number/quality of financing sources
- Cost per vendor invoice processed
- Finance department headcount cost as % of respective tools
- Yield on investments/effective interest rate on borrowings
- Amendments to tax returns required / effective tax rate / default notices on covenants
- Foreign currency translation and transaction results

Other Symptoms of Poor Performance	• Capital shortages • High debt / equity transaction costs • High effective tax rates	• Lack of action following internal / external audit recommendations • Inaccessible information • Manual systems / workflow	• Too many / few controls • Reports done outside financial systems • Decentralized sales / use tax administration
Performance Improvement Opportunities	• Change management • Performance measurement Work process simplification • State tax minimization • Management reporting review • Internal audit review	• Activity-based management study • Electronic data interchange • Treasury review • Sales tax planning • Global reporting	• Bench-marking study • Foreign sales corporation review • Activity value analysis • Payroll tax planning • Unemployment tax planning