



ITU / BDT- COE workshop

Bangkok, Thailand,

11 – 15 November 2002

Network Planning

Lecture NP- 3.6

Business Planning

November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 1



Content Chapter 3.5

- **Role of business Planning today. Basic concepts**
- **Telecom business modeling**
- **Typical evaluation results**
- **Main actions to increase performance ratios**

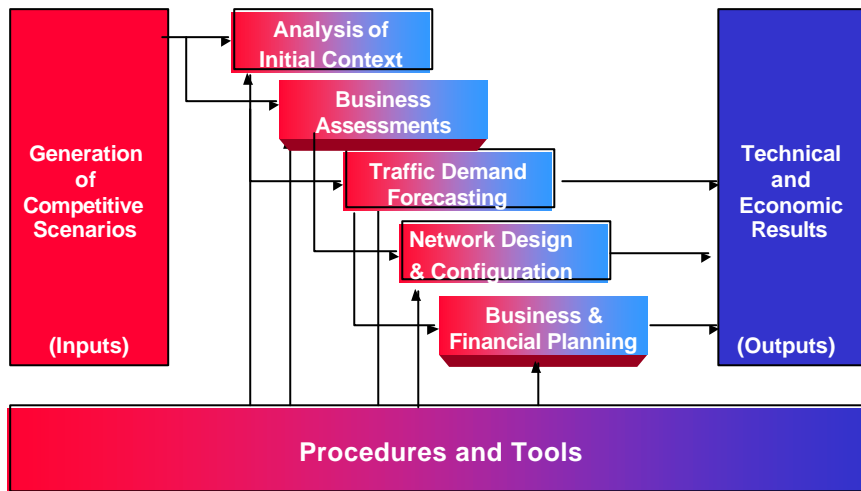
November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 2



Planning Methodology: Integrated Iterative Planning Process



November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 3



Definition of business plan

A Business Plan presents the calculation of the financial indicators that enable the managers to evaluate the financial performances of an enterprise in order to take decisions.

A Business Plan summarises the results of the planning process:

- the objectives to reach (subscribers demand, sales)
- the description of all **activities** requested by the project;
- the future **revenues** expected from the project;
- the planned **expenses** (investment and operations);
- the accounting statements and the **financial indicators** characterising the profitability of the project.

November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 4



Types of business plans

Strategic Business Plan for evaluating a strategy:

- aid for making internal decisions for the whole company
(strategic guidelines at the national level, all markets)

Tactical Business Plans for specific projects :

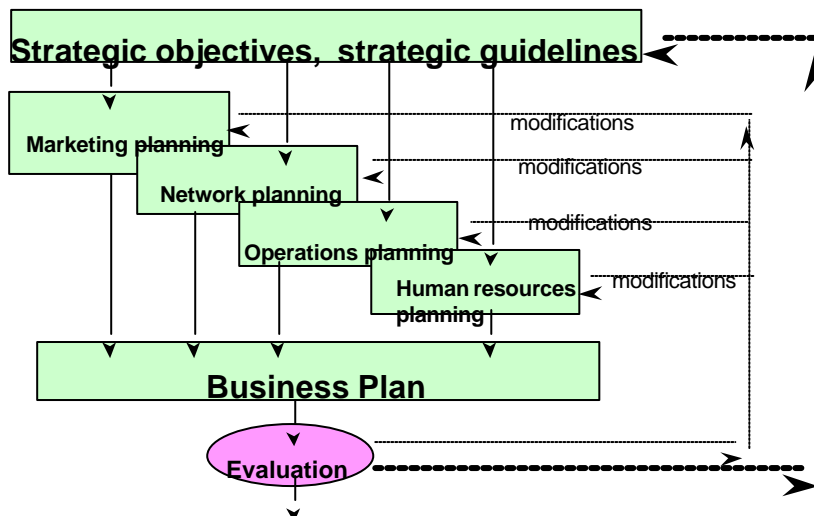
- aid for making internal decisions for a particular area, or a market segment: IN, mobiles, IP

Short term Business Plans for management control :

- aid for monitoring the implementation of projects
- preparation and follow-up of budgets,

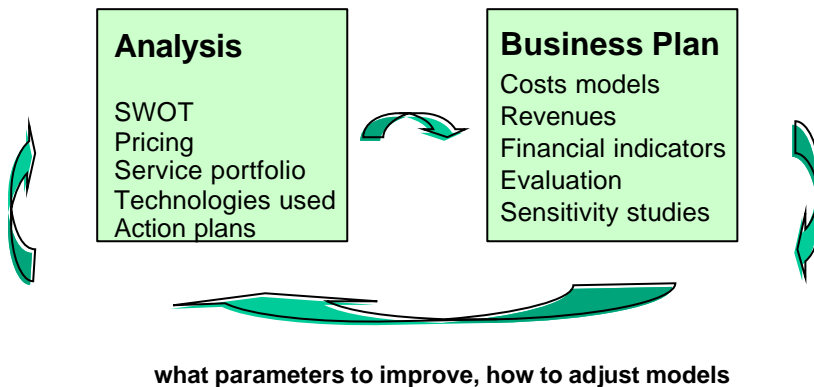


Iterative process for evaluation





Interaction between analysis and business plan



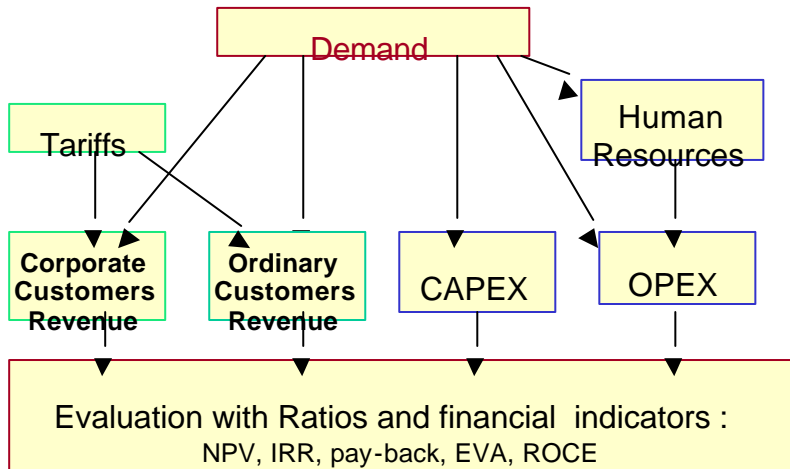
November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 7



Business model structure



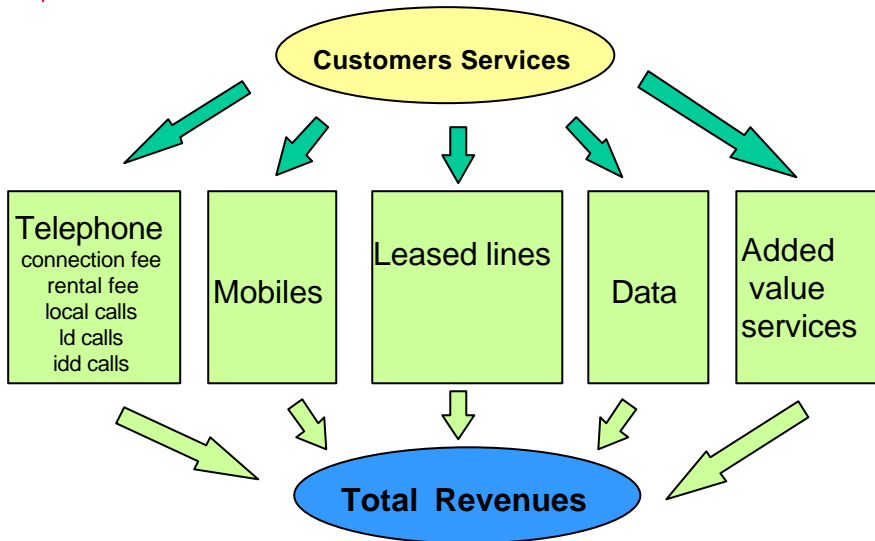
November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 8



Business model: Services Revenues calculation



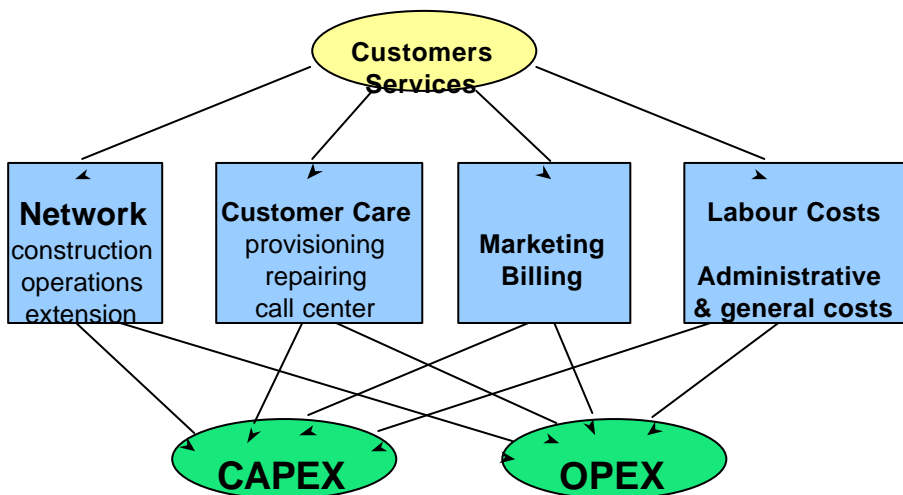
November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 9



Business model : Expenses calculation



November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 10



Business model: Financial Statement

- **Income Statement:**
Net income = revenues - expenses
- **Balance Sheet:**
Company capital = Assets - liabilities
- **Cash flow statement :**
Cash balance = Inflows - outflows

**All fundamental financial indicators are carried out
with the elements of these 3 statements**



Business model Financial indicators calculation

The most useful economical indicators are :

- Net present value (NPV)
- Internal rate of return (IRR)
- Discounted Payback period (DPP)
- Net cash flow (NCF)
- Discounted cash flow (DCF)
- Operating income
- Revenue per service/service class



The purposes of the accounting statements

Income statement

→ *to analyse potential profit*
is the profit enough ?

Balance statement

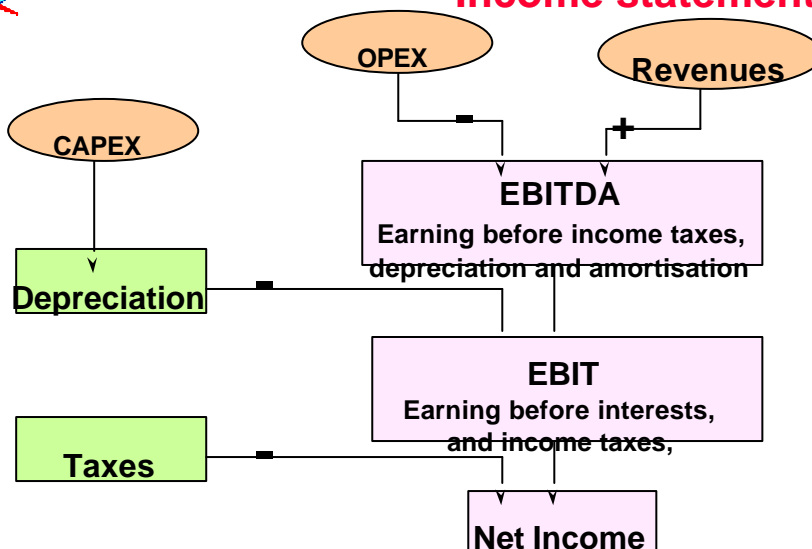
→ *to analyse the financial structure*
how to finance the development
enough / too much equity ? Enough/ too much debt

Cash-Flow statement

→ *to make payments at every due date*
to have the righth cash at the righth time



Business model Income statement





Business Model CAPEX: Capital Expenditures

CAPEX contribute to extend the fixed assets, and they are depreciated over an economic life time

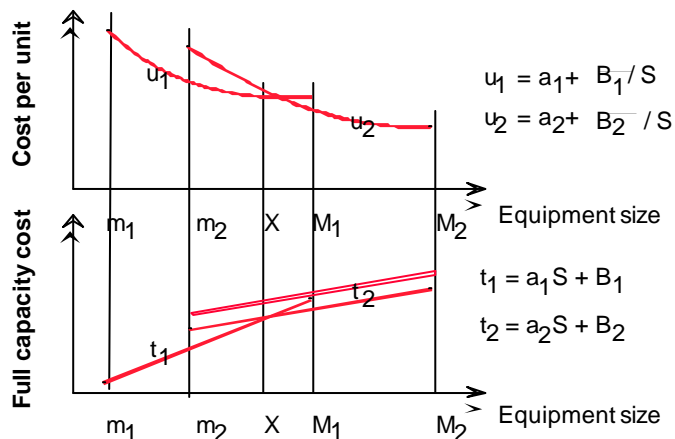
CAPEX are necessary for extending the business or for improving the range of services provided by the operator.

Examples :

- Purchase of land & buildings,
- Network construction
- Purchase of information systems (hardware & software)



Business Model : Importance of Modeling Economy of scale per technology and size

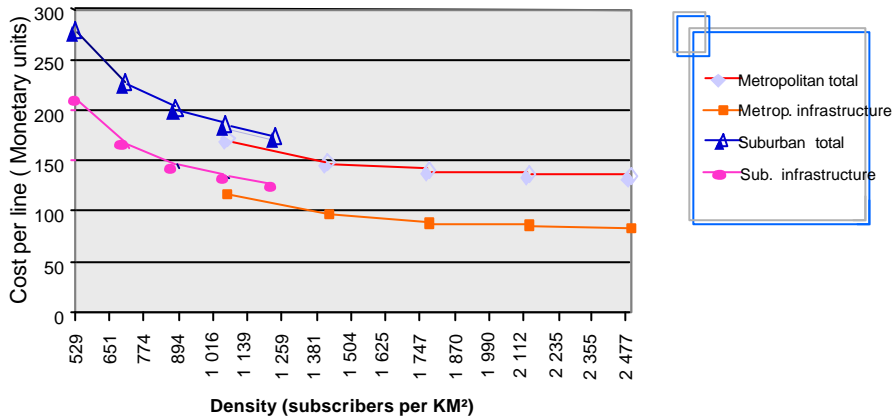


Impact by occupancy or fill-in degree



Business Model : Importance of Modeling

Economy of scale per location



Cost Impact by customer density (NPV)

November 12th

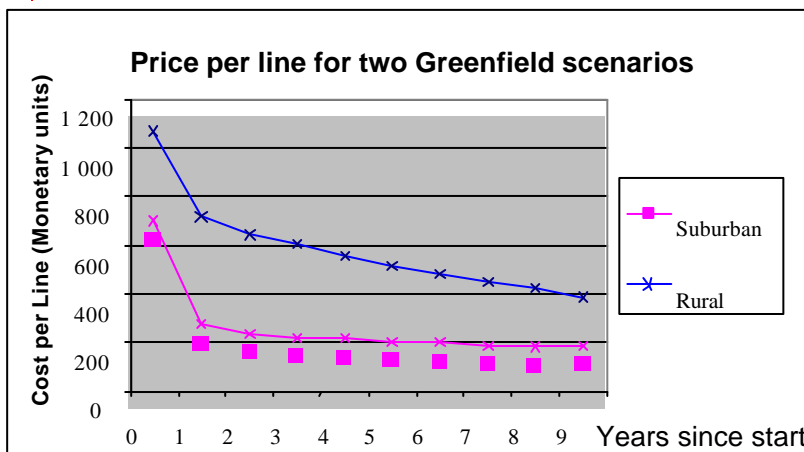
ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 17



Business Model : Importance of Modeling

Economy of scale through time



Impact by customer volume

November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 18



OPEX= Operations Expenditures

OPEX are expenses which don't contribute to extend the fixed assets, and consequently are not subject to depreciation

OPEX are necessary for running the company,

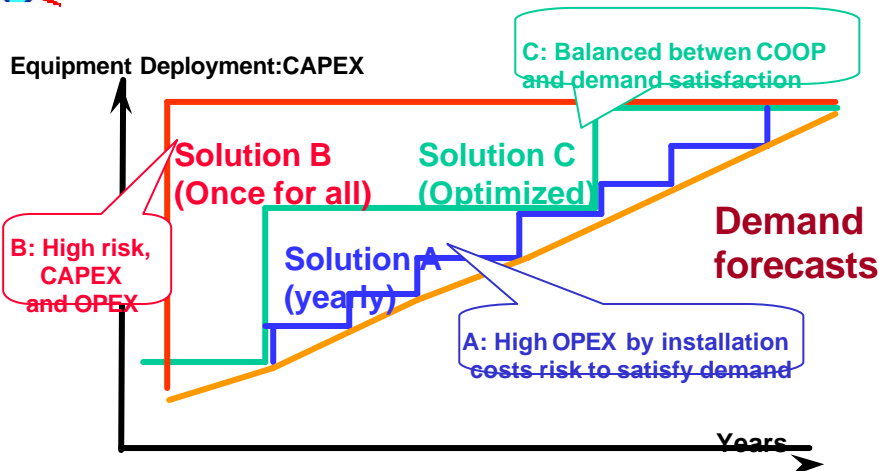
- Technical operations (switching, transmission, local loop,..)
- Commercial operations (marketing and sales)
- Administrative operations (support,..)

Examples :

- Labor costs for operations,
- Travelling expenses, periodic administrative costs,
- Rental of equipment, rental of cars, rental of buildings
- Interconnection fees



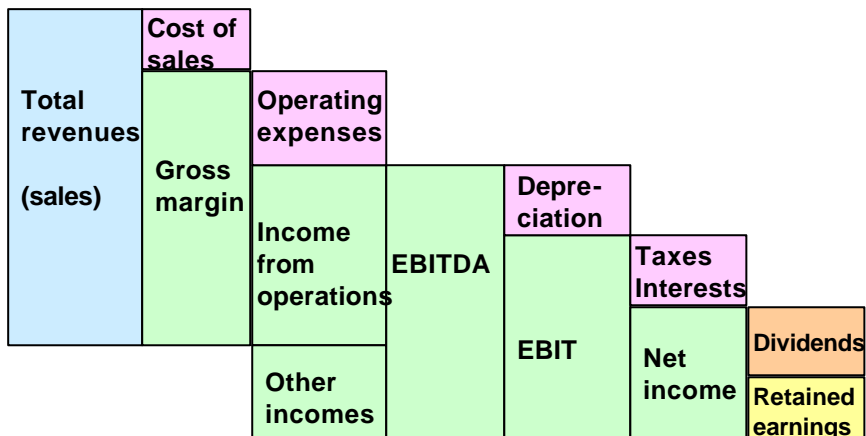
Business Model : Importance of Modeling Deployment Strategies



Major impact on CAPEX and OPEX



Business model Income statement



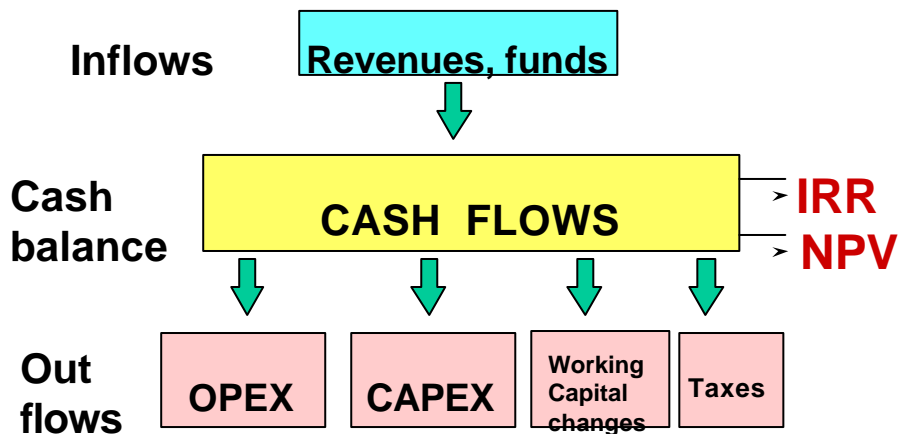
November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 21



Business model Cash Flow



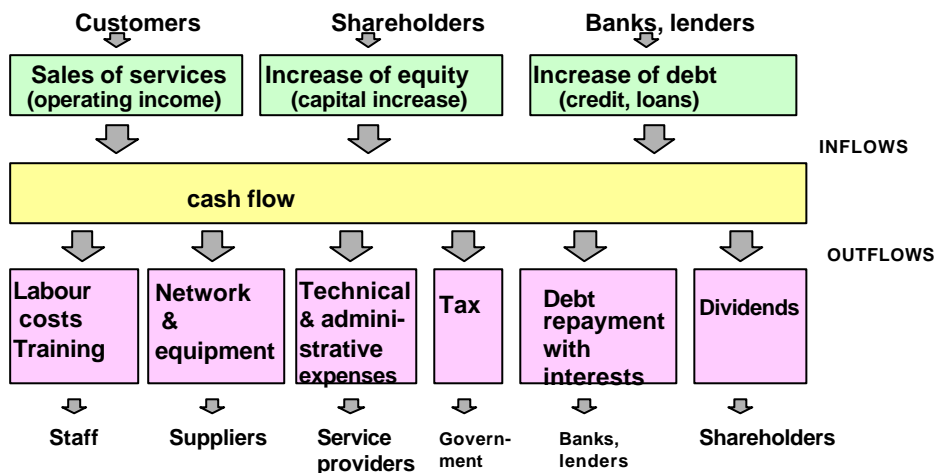
November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 22



Business model INFLOWS and OUTFLOWS



November 12th

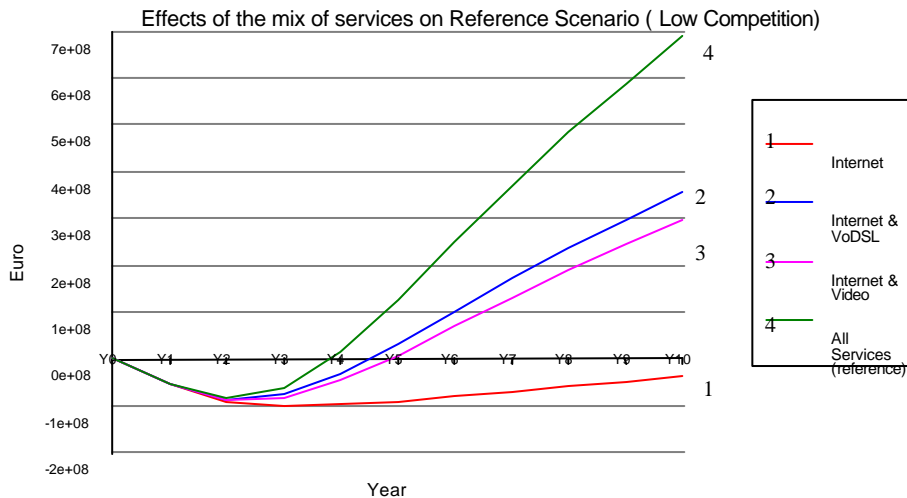
ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 23



Network Solutions Optimization Example for what-if economical analysis

Network NPV for new multiservice network operator



November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

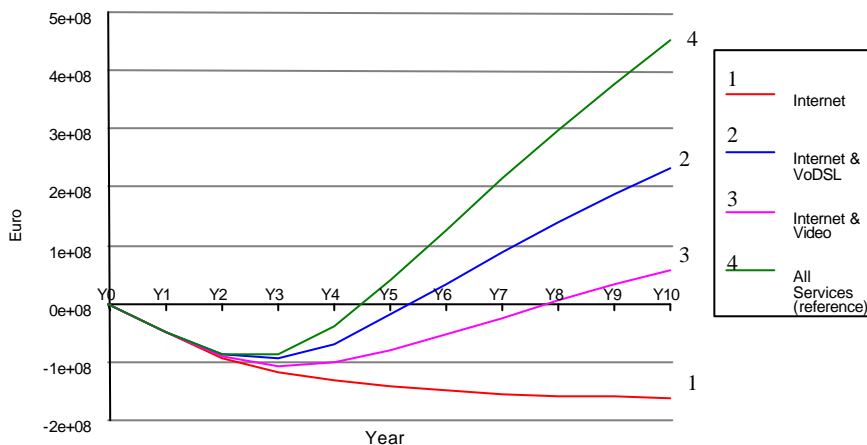
Lecture NP - 3.6 - slide 24



Network Solutions Optimization Example for what-if economical analysis

Network NPV for new multiservice network operator

Effects of the mix of services with **decreased revenues (30%) in High Competition**



November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 25



Typical guidelines for Cashflow improvements

- To increase the number of new customers
- To keep the loyalty of present customers
- To increase the sales of new lines
- To introduce new services/service bundle in the portfolio
- To increase the paid revenue per customer
- To minimise expenses by improving management

November 12th

ITU/BDT-COE Network Planning/ Business Planning - O.G.S.

Lecture NP - 3.6 - slide 26



Typical Action plans for Cashflow improvements

To improve the customer segmentation,

better identification of major accounts
better statistics for each market segment

To carry out market research studies

Impact of potential competitors on the market shares

To carry out customer satisfaction surveys

To improve the Portfolio of products and services,

Impact of new technologies (internet, mobiles, satellites)



Increasing the sales of new lines

Waiting list management

where are people waiting for new lines

Field survey

where are people who will demand a line later

Construction of complete lines ready to sale

how matching capacity and demand

Sales promotion

how to speed up the sales of available lines

Service provisioning

how to speed up service delivery



Service provisioning

- **Objective : to speed up service delivery**

Many types of units are involved in the process and must be coordinated :

- administrative tasks for the commercial file
- billing file to be activate
- charging system in the switching unit
- customer care
- open-wire to be installed and connected
- MDF (main distribution frame) to be updated
- CPE to be installed and connected