

# FUNDAMENTALS OF SUPPLY CHAIN MANAGEMENT

## SOURCING AND SUPPLIER MANAGEMENT

- The sourcing process
- Sourcing strategies
- Buyer-Supplier relationships
- Supply base management (tiering)

# THE SOURCING PROCESS

- **The meaning of Sourcing**

It is the process of identifying, selecting, and developing suppliers. It is that part of the procurement process concerned with 'how and where services or products are obtained'.

It is rightly argued as the most important part of the procurement process because if the right and correct source decision is made in a particular instance, then the buying organisation's needs should be met perfectly.

# THE SOURCING PROCESS (Cont.)

- **LEVELS OF SOURCING DECISIONS IN ORGANISATIONS**

- **TACTICAL SOURCING**

This relates to procurement decisions on sourcing that are made at the lower level management, on low risk, low profit, and non-critical/routine items or services.

Tactical sourcing is also employed in the formulation of short-range decisions as to how specific supply requirements are to be met, in response to changing or temporary conditions in the organisation or supply market; for example supplier failure, supply disruption or fluctuations in demand.

# THE SOURCING PROCESS (Cont.)

- **LEVELS OF SOURCING IN ORGANISATIONS (Cont.)**

- **STRATEGIC SOURCING**

These are long-term sourcing decisions made at the top level management relating to items or services that are of high value, high risk and those items or services that contribute to high profits in a business.

Sourcing, from a strategic point of view, can be defined as a systematic process that directs procurement and supply managers to plan, manage, and develop the supply base in line with the organization's strategic objectives.

# THE SOURCING PROCESS (Cont.)

## STRATEGIC SOURCING (Cont.)

These decisions balance internal and external activities; and aligns business strategy , business processes and product requirements.

These decisions always address the '*what if*' questions; for example:

What if there is a deterioration in an existing supplier's quality on performance?

What if there is a delivery failure or poor services by the existing source?

What if there is a large price increase of prime raw materials?

# THE SOURCING PROCESS (Cont.)

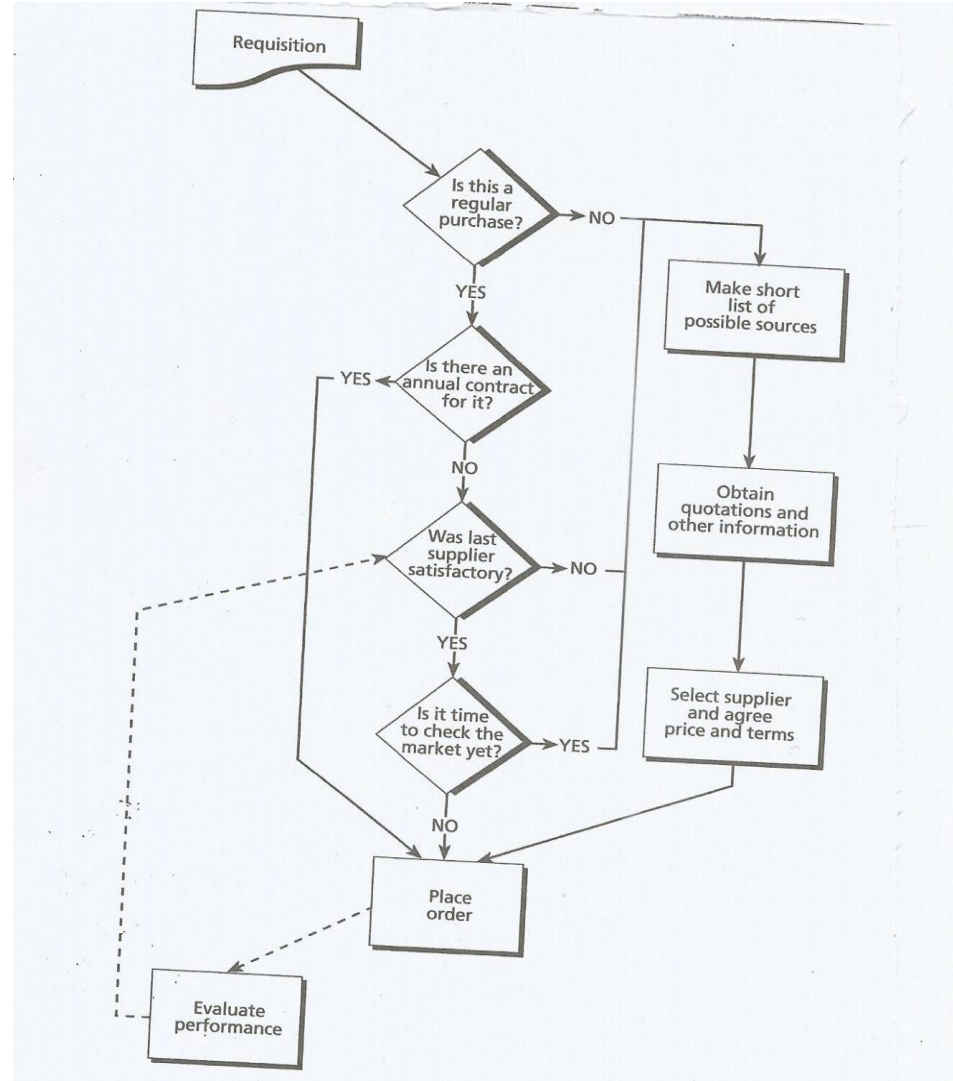
- SOURCING DECISION MAKING

A good sourcing decision process must lead to the ultimate selection of the best supplier, in the most economical manner possible.

In order to reduce time and costs, a buying organisation ought to check if there is already a long-term contract, in which case an order could be placed.

In the absence of the long-term contract, it has to be established if there is an existing supplier whose performance is satisfactory, of which to order from; or a need to enlist and evaluate possible suppliers available on the market.

# THE SOURCING PROCESS (Cont.)



# SOURCING STRATEGIES

Basically, sourcing strategies are employed by buying organisations in order to minimise supply risks, so that disruptions of operations which have an impact on overall organisational objectives are avoided.

Sourcing strategies are therefore applied depending on the nature of product to be procured in terms of availability of its suppliers on the market and/or its value to the organisation with regards to total cost and its contribution towards profits.



# SOURCING STRATEGIES (Cont.)

The Kraljic matrix/Procurement positioning portfolio, developed by Peter Kraljic (1983) is one of the tools used in order to determine the best sourcing strategy as it categorises products/services in accordance with their contribution towards profit (financial risk), as well as the complexity of the item's market (supply risk).

- **Financial risk** relates to the value of the product/service in terms of its cost, as well as how it contributes to the buying organisation's profits and/or cost reduction.
- **Supply risk** relates to how complex the product/service's market is, i.e. the level of difficulty in finding the product on the market and how much, in the event of unavailability of the product, can the buying organisation's operations be affected.

# SOURCING STRATEGIES (Cont.)

## *The Kraljic Matrix*



# SOURCING STRATEGIES (Cont.)

- **Routine/Non-critical items**

These are items in the quadrant of low supply risk and low financial risk, whose procurement decisions are made by lower level staff.

Since the need of these low value items in a buying organisation is recurring and supplies are abundantly available on the market, procurement costs have to be avoided, for example by using blanket ordering.

- **Leverage items**

These are items in the high financial risk and low supply risk quadrant.

These items are of high value or contribute significantly towards a business' profit. They are easy to source on the market as suppliers are abundant, such that the buying organisation is at low risk of operations disruptions in case of supplier failure. The buying organisation should therefore take advantage of higher bargaining power.

# SOURCING STRATEGIES (Cont.)

- **Bottleneck items**

These items are in the high supply risk and low financial risk quadrant.

There are few suppliers of these items on the market and they do not account significantly to the buying organisation's spending portfolio.

They are items that are not primary components or ingredients of the final product.

They do not account for a high significant of spend but there scarcity can cause disruptions of operations in form of delays or reduction in production capacity.

The buying organisation must always ensure supply continuity of these items to avoid disruptions.

# SOURCING STRATEGIES (Cont.)

- **Strategic items**

These are items that are key to the buying organisation's operations.

They deserve much attention from high level managers since they are of high value and account for a significant spending portfolio, and largely contribute towards the organisation's profits or overall objectives.

The items are of high supply risk because of few suppliers on the market, and supplier failure can result in huge repercussions to the buying organisation's operations.

The buying organisation needs to ensure managing total cost of the items as well as proper supplier management to ensure continuity of supplies.

## SOURCING STRATEGIES (Cont.)

- **Strategies/sourcing decisions**

- Sole sourcing

This strategy arises out of a situation in which there is only one supplier available on the market for a given item or service, i.e. items that have a monopoly or oligopoly market.

In this market:

- Only one supplier of a good or service exists in the supply market. This may be a single organisation, or a consortium formed for the purpose of controlling supply (cartels) e.g. OPEC.
- Has high barriers to entry such that potential competitor suppliers are barred by reasons such as legal framework (regulations, patents, copyrights), high capital requirements.
- The product or service has no substitutes such that there is no any other similar product or service that can satisfy the buying organisation's needs.

## SOURCING STRATEGIES (Cont.)

With sole sourcing, it has to be noted that the balance of bargaining power favours the monopolist supplier hence is able to dictate terms and conditions including high prices as the buyer can not take his business to another supplier elsewhere.

However, it is not always that a monopoly is disadvantageous to the buyer. Some monopolistic suppliers enjoy economies of scale (cost savings due to large size) whose benefits can pass on to the buyer.

For example, large-scale production may result in use of production's full capacity hence full utilisation of fixed costs.

# SOURCING STRATEGIES (Cont.)

A buying organisation should however avoid being in a sole sourcing situation owing to the disadvantageous bargaining power.

Engagement with user departments is vital in coming up with specifications that are competitive in nature.

In situations where sole sourcing is inevitable, the buying organisation should work on enhancing its negotiation power by:

- Identify how costly it is for the supplier to lose you as a customer.
- Use leverage of a long-term contract.
- Use segmentation approach by using competitive bidding method in some part of the requirement e.g. maintenance/service.



# SOURCING STRATEGIES (Cont.)

- Single sourcing

In single sourcing, one supplier is selected to be supplying exclusively.

There are multiple choices available and different suppliers on the market have the capability to provide the desired product or service.

The buying organization has the opportunity to use competitive bidding, negotiate, and select the supplier that offers best value and cost for the organization.

# SOURCING STRATEGIES (Cont.)

- Reasons for single sourcing strategy
  - Total requirement is too small to split and miss discount opportunities as well as lessen handling and processing cost.
  - The single supplier selected is so far ahead of others in terms of reputation, quality, price, etc., hence no need to waste time in dealing with other suppliers.
  - Expensive set-up costs if the relationship requires systems integration.
  - The requirement is subject to supply risk hence requires high supplier commitment which can be achieved through offering of the status of an exclusive supplier.

# SOURCING STRATEGIES (Cont.)

Although single sourcing strategy might achieve loyalty, it poses a great risk upon the buying organisation in cases of supplier failure.

The buying organisation can pre-qualify a contingent supply who can come to the rescue, although it is not guaranteed that the contingent supplier will prioritise the buying organisation.

This is why there is another sourcing strategy:

- Dual sourcing

This is when a buying organisation splits supplies into two suppliers.

This strategy is employed to minimise the risks posed by over-dependency on a single supplier whilst achieving benefits of having a narrow supply base.

In both single and dual sourcing strategies, the buying organisation must always be vigilant to make sure that the supplier (s) is not complacent and is making efforts of continuous improvement and competitive performance.

# SOURCING STRATEGIES (Cont.)

- Multiple sourcing

This strategy is aimed at reducing the supply risk by having several potential suppliers pre-qualified and approved to be used on a given item or service.

The buying organisation reduces the risk associated with supplier failure as it has other suppliers who can ably satisfy its needs.

Also, the buyer becomes opportunistic as it can leverage on the advantages of competition among the suppliers in offering the best value (prices, quality and other trading terms).

However, the buyer might be losing out on high volume purchase discounts as it splits its orders among its many suppliers.

# SOURCING STRATEGIES (Cont.)

- Outsourcing

Outsourcing is the delegation of work previously carried out in-house to an external service provider (CIPS).

It is also defined as the strategic use of outside resources to perform activities traditionally handled by internal staff and resources (The Outsourcing Institute).

White & James (1993) define it as a contractual relationship between an external vendor and an enterprise in which the vendor assumes responsibility for one or more business functions of the enterprise.

# SOURCING STRATEGIES (Cont.)

Much as outsourcing is advantageous to an organization/business, it should only be applied in the following context:

- ❖ Non-core competencies

Core competencies are activities that are primary to the organization's operations. It is advised not to outsource these activities.

- ❖ Activities for which external contractors have required competencies

An assessment has to be made whether the external entity to outsource from is more competent on what to be outsourced than the buying organization. If that external entity is not competent enough then it is better to make.

- ❖ Activities for which value for money is offered by outsourcing, in relation to service levels that can be obtained.

Activities can be outsourced if the buying organization will achieve efficiency, effectiveness, as well as being economic.

# SOURCING STRATEGIES (Cont.)



# SOURCING STRATEGIES (Cont.)

## ❑ Advantages of outsourcing

- ❖ Organizational rationalization and downsizing by reducing costs of staffing, space and facilities.
- ❖ Economies of scale as contractors may be serving many customers.
- ❖ Gives access to specialist expertise, technologies and resources.
- ❖ Allows an organization to focus on its core competencies thereby leading to customer satisfaction.



# SOURCING STRATEGIES (Cont.)

## ❑ Disadvantages of outsourcing

- ❖ There is potential of paying high fees than making in-house as the contractor would have to add a profit margin.
- ❖ There is a risk of losing control over confidential business information.
- ❖ Widening distance between a business and its customers, if the outsourced activity is one of the interface activities e.g. distribution and marketing.
- ❖ Potential loss of in-house expertise, technologies or knowledge in the outsourced activities which may be required in future to be in-housed.

# SOURCING STRATEGIES (Cont.)

- Offshoring

This is a business decision related to outsourcing, in which a business activity is relocated from the business' home country to a different international location.

The simple difference of this concept with outsourcing is that offshoring is about where the activity is done by the business, whilst outsourcing is about who does the activity for the business within its borders.

# SOURCING STRATEGIES (Cont.)

## ❑ Advantages of offshoring

- ❖ It lessens the distance between a business firm and its international customers in and around the country to which an activity has been offshored.
- ❖ It gives access to better skills, resources and expertise existing in the hosting countries.
- ❖ Enables reduction of costs by producing in host countries where labor is cheap.
- ❖ Enables access to other countries' favorable government policies e.g. tax exemptions.

# SOURCING STRATEGIES (Cont.)

## ❑ Disadvantages of offshoring

- ❖ It can lead to increased unemployment in the resident country thereby losing goodwill.
- ❖ Potential for increased management costs e.g. travel costs for management (quality control).
- ❖ Longer lead times for supplies if a business is relying on its offshore activity as a source supplies.
- ❖ Communication, cultural and time zone differences may affect interface between the offshore staff and the business' home location staff/international customers.

# BUYER-SUPPLIER RELATIONSHIPS

**Think for a moment!**

Can there be a bond between a customer and a seller?

On what basis would there be a relationship between a purchaser and a seller, when all they really have are a series of impersonal exchanges or transactions. And even if there would be repeat business, does it necessarily imply loyalty or commitment? It would merely be because of satisfactory fulfilment of a repeated need.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

A business relationship implies meaningful ties or links between commercial entities. These ties or links can be in the form of:

- ❖ Actor bonds: These are recurring contacts, interactions and communication between individuals in each firm involving the development and use of personal contacts.
- ❖ Activity links: This entails doing things together, in form of commercial transactions, co-ordination of plans, collaboration (working together) e.g. through data sharing.
- ❖ Resource ties: The investing of resources such as time and finances. Close relationships often result when one or both parties invest in adaptations made especially for the other party, such as integration of supplier and buyer information systems. The adaptations eventually create mutual dependency hence costly to switch suppliers.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- RELATIONSHIP DRIVERS

These are key qualities or values that build or enhance commercial relationships:

- ❖ Quality of interaction

This is represented by experience during each time the buyer and supplier encounter.

The relationship depends on the supplier's ability to consistently fulfilling the customer's expectations and to create a positive experience of doing business at every encounter with the customer.

Therefore, a business encounter can either result into building or undermining trust, creating goodwill or conflict, enhance or impede co-operation, and over time make each party more or less desirable to do business with the other.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

## ❖ Trust

This is central to the success of supply chain relationships. It reduces the risk of doing business together and supports mutual investment in the relationship. If suppliers distrust a buyer, they are unlikely to share information, put efforts into proposals and tenders, or invest in collaborative process improvements or systems integration.

## ❖ Transparency

This is the willingness to share information and it depends on the level of trust as information can be misused, either to the advantage of one party at the expense of the other, or released to unauthorised third parties e.g. competitors. Transparency fosters mutual understanding of both parties' needs, concerns and potential contribution.



# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

## ❖ Commitment

This is the intention or desire of one or both parties to continue in a relationship, and to invest in maintaining it. If parties are committed to the relationship, they are more likely to be loyal and reliable, and contribute to shared goals, over and above mere compliance with contract terms or basic expectations. Commitment is therefore important for adding value and minimising risk.

## ❖ Co-operation and collaboration

Commercial relationships need not be of a negative competition such that the other has to be eliminated. Suppliers and buyers, and even competitors, can work together to add value in their businesses.

## ❖ Mutuality

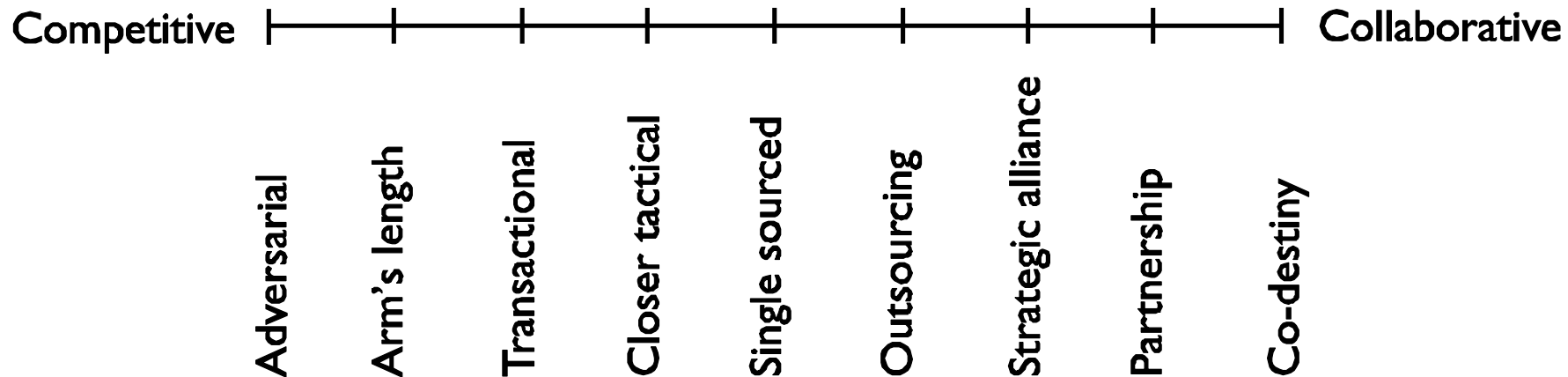
Both parties must be gaining from the relationship hence there should be a spirit of reciprocity in both parties, so that they both share benefits as well as risks of the relationship fairly. If one party does not gain out of a relationship, it becomes exploitative and makes the relationship short-lived.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- TYPES OF RELATIONSHIPS

Commercial relationships vary from a one-off arm's length transaction to the other end of long term collaborative partnership, depending on the extent of their intensity, mutuality, trust and commitment.

This is depicted in a relationship spectrum:



# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Adversarial relationship

In these relationships, each party seeks to obtain the best possible outcome for itself at the expense of the other party if necessary.

It can lead to a win-lose situation, where any gains for the buyer are at the expense of the supplier, and vice-versa, e.g. the buyer gets the best price by squeezing the supplier's profit margins, or the supplier enhances its profits by cheating on the quality of products sold.

Characteristics of an adversarial relationship:

- Lack of trust hence little or no information sharing.
- A one-off or short-term transaction focus.
- The use of power or negotiation to seek the best possible deal.
- Little co-operation or recognition of mutual interest.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Arm's length relationship

This is a distant relationship where the buyer does not need frequent access to the supplier. Purchases are infrequent and of low volume, and the trouble of a closer relationship is not justified.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Transactional relationship

This is very similar to an arm's length relationship, with perhaps a more frequent requirement on the part of the buyer, but still referring to low-value, low-risk supplies.

## ***When is a transactional relationship appropriate?***

- Situations where the trouble and expense of developing a long-term collaborative relationship are not justified
- Nature of product being purchased (**little or no strategic importance**)
- Many suppliers exist
- Items purchased rarely
- Forced upon the buyer (product purchased is of **high strategic importance to the buyer but of little importance to the supplier**, who in these instances is usually larger than the buying organisation)

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Closer tactical relationship

This refers to a situation where the trouble of a close, collaborative relationship is not quite justified, but where the buyer is concerned to ensure that he is dealing with a very competent supplier, who perhaps also coordinates the activities of other suppliers. This can be applicable for items that are of low supply risk but very important to the buying organisation (Leverage items)

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Single-sourced relationship

In relation to a particular item, or a defined range of items, a buyer grants exclusivity to a single supplier, undertaking not to buy such items from anyone else in order to achieve commitment. This entails a high level of trust between buyer and supplier.

- Outsourcing relationship

In order for the buyer to focus on the business' core competencies, the buyer selects an external supplier to provide goods or services previously sourced in-house, demonstrating a high level of trust and collaboration.

- Strategic alliance

Two (or more) separate organisations identify areas where they can collaborate to deliver a joint offering. For example, a software developer might form a long-term bond with a training firm, the trainer providing courses in using the software.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Partnership relationship

Buyer and supplier agree to collaborate closely for the long term, sharing information and ideas, and resources for development. There is a very high level of trust and the aim is to find solutions that benefit both parties without detriment to either.

***When is a partnership relationship appropriate?***

- Where customer has a **high spend** with the supplier
- Where the customer faces **high risk**
- Where the product supplied is **technically complex**
- Where the supply market for the product is **fast changing** thereby needing frequent upgrades.
- In a **restricted supply market** (few competent and reliable suppliers)



# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Co-destiny relationship

This is an extremely closer relationship, in which buyer and supplier link their businesses together for long-term mutual benefit. There is a high level of trust and interdependence, such that if one party's business ceases to exist, the other is more likely to cease too.

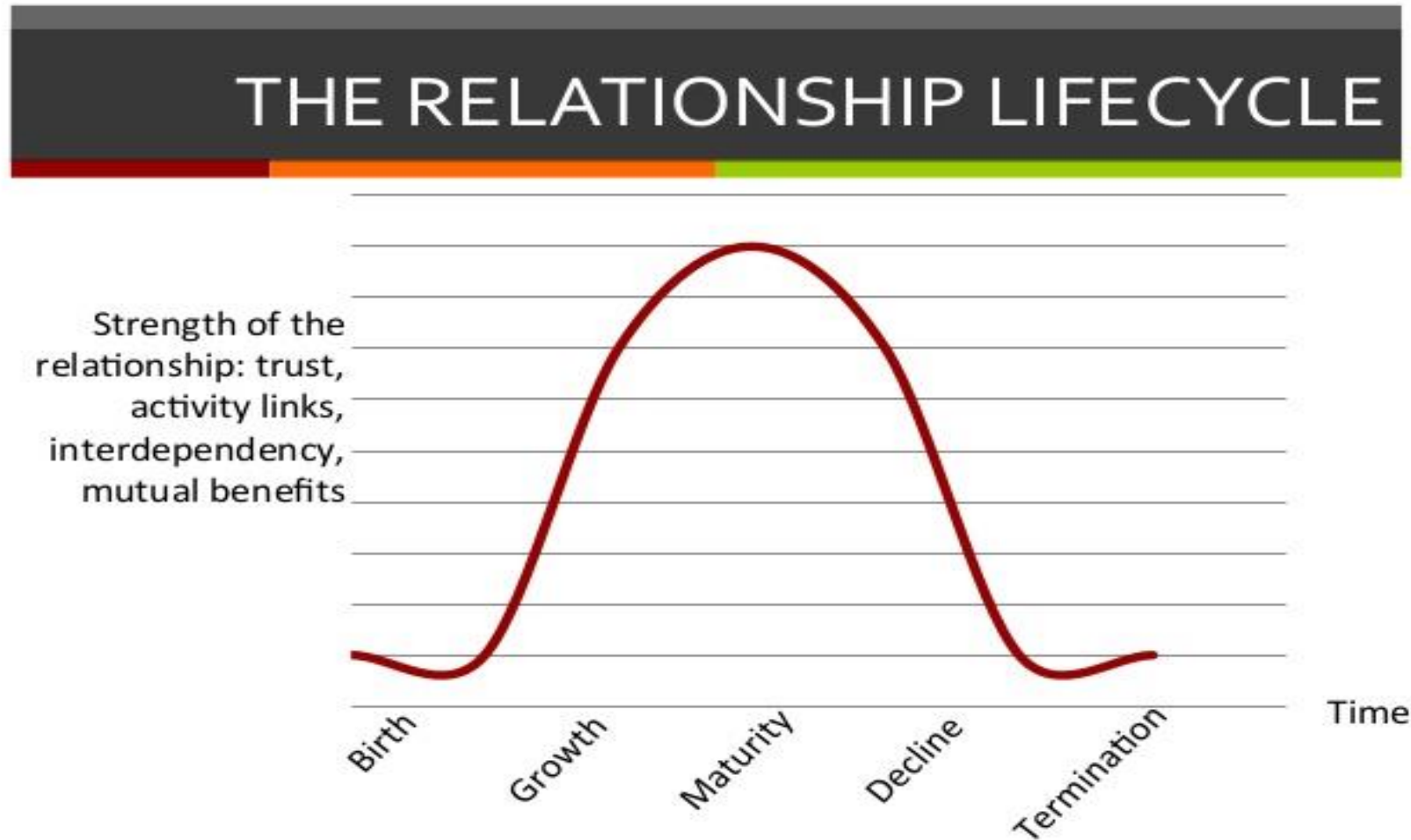
# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- **THE RELATIONSHIP LIFECYCLE**

Just like organisms, relationships can be observed as they progress through a lifecycle of stages comprised of birth, growth, maturity, decline and termination.

It is vital for both the buying and selling organisations to be mindful of the stage at which their relationship stands, for better relationship management.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)



# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Birth stage

This should involve the selection of a compatible partner and negotiating each party's terms and expectations.

It is also important to establish systems for ongoing interaction and communication.

- Growth

This involves a commercial relationship progressively upgrading through increased contacts and trust.

It also involves managing emerging issues and conflicts and continually checking that objectives are being met to both parties' satisfaction.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Declining stage

Relationships run their course by achieving intended objectives, or become stale and complacent, or cease to be profitable.

Sometimes the needs and circumstances of parties change.

This stage leads to either revival of a relationship or termination.

If it can not be revived, resources have to start being diverted and that internal and external stakeholders should be informed and supported.

# BUYER-SUPPLIER RELATIONSHIPS (Cont.)

- Termination

Reasons for termination might be:

- Buyer has changed the type of products it makes or sells
- Supplier makes a strategic shift into other supply markets
- A new supplier enters the market, offering terms the existing supplier cannot match
- Dispute about quality of goods supplied

Ending the relationship must be done constructively reserving chances of entering into another relationship in future.

Lessons have to be learned for effective relationship management.

Also, avoid unnecessary conflicts and reputational damage e.g. lawsuits and negative public relations.

# SUPPLY BASE MANAGEMENT

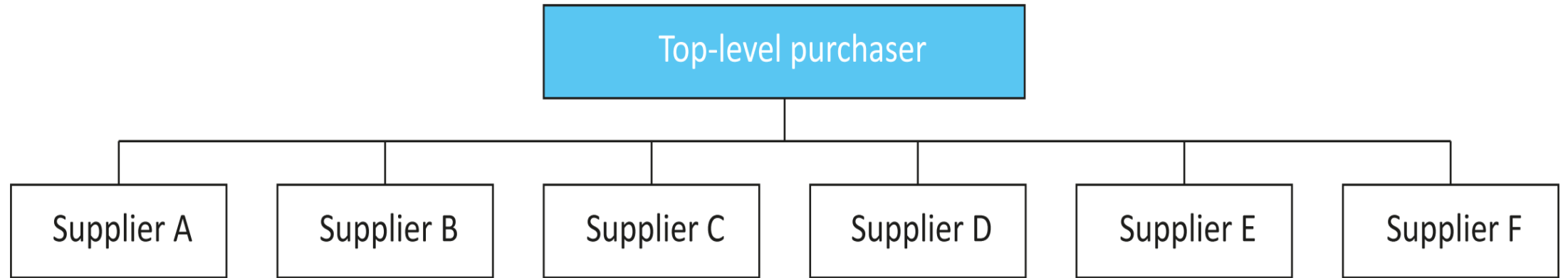
Supply base is the pool of sources of a buying organisation's supplies. It is composed of all the current suppliers/vendors that the buying organisation deals with.

Management of the supply base aims at having few/optimum number of suppliers who are innovative, flexible, and capable of satisfying the ever changing needs of the buying organisation whilst at the same time achieving cost saving.

A supply base can be **broad** or **narrow**.

A broad supply base entails having a large number of potential suppliers of a given item or category of purchases, pre-qualified and approved as being able to meet a buying organisation's needs or requirements.

# SUPPLY BASE MANAGEMENT (Cont.)





# SUPPLY BASE MANAGEMENT (Cont.)

This helps in managing supply risk regarding shortages or disruptions (e.g. because of political unrest or bad weather in one supplier's area), or unforeseen peaks in demand (creating an extra need for supplies), or a supplier failure.

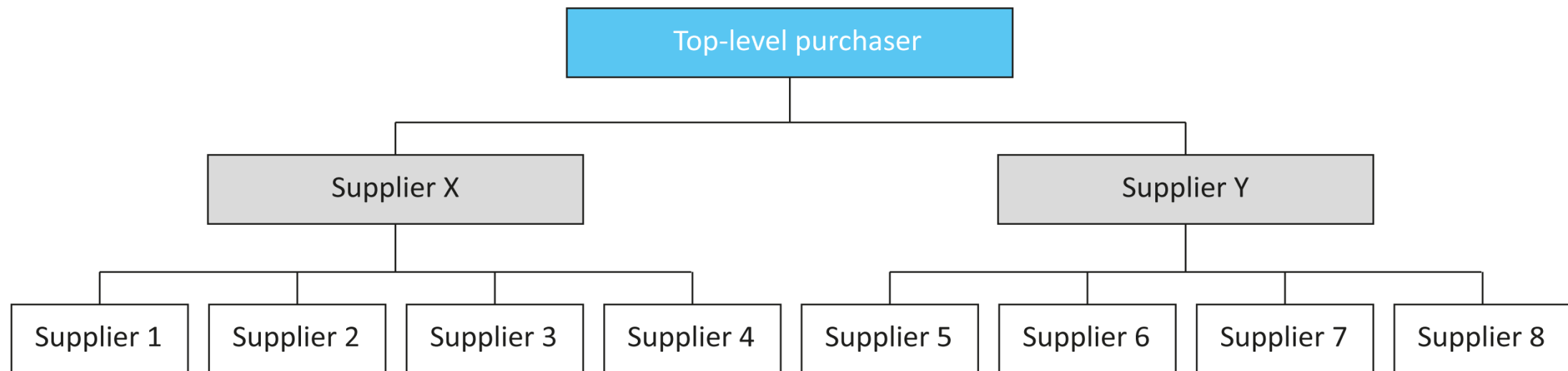
A broad supply base is also typical in a buying organisation seeking to maximise its role in value adding processes by taking in only a minimum contribution from outside suppliers. For example if a manufacturer buys in parts from a number of suppliers, and assembles them through a number of stages to produce a finished product, the structure in terms of its supply base will be very broad.

# SUPPLY BASE MANAGEMENT (Cont.)

A narrow supply base however has a limited number of suppliers on a particular item or procurement category.

This is the common trend of recent due to increasing need of strong collaborative supplier relationships.

A narrow supply base enables purchases to be concentrated on a smaller group of developed and trusted supply partners.



# SUPPLY BASE MANAGEMENT (Cont.)

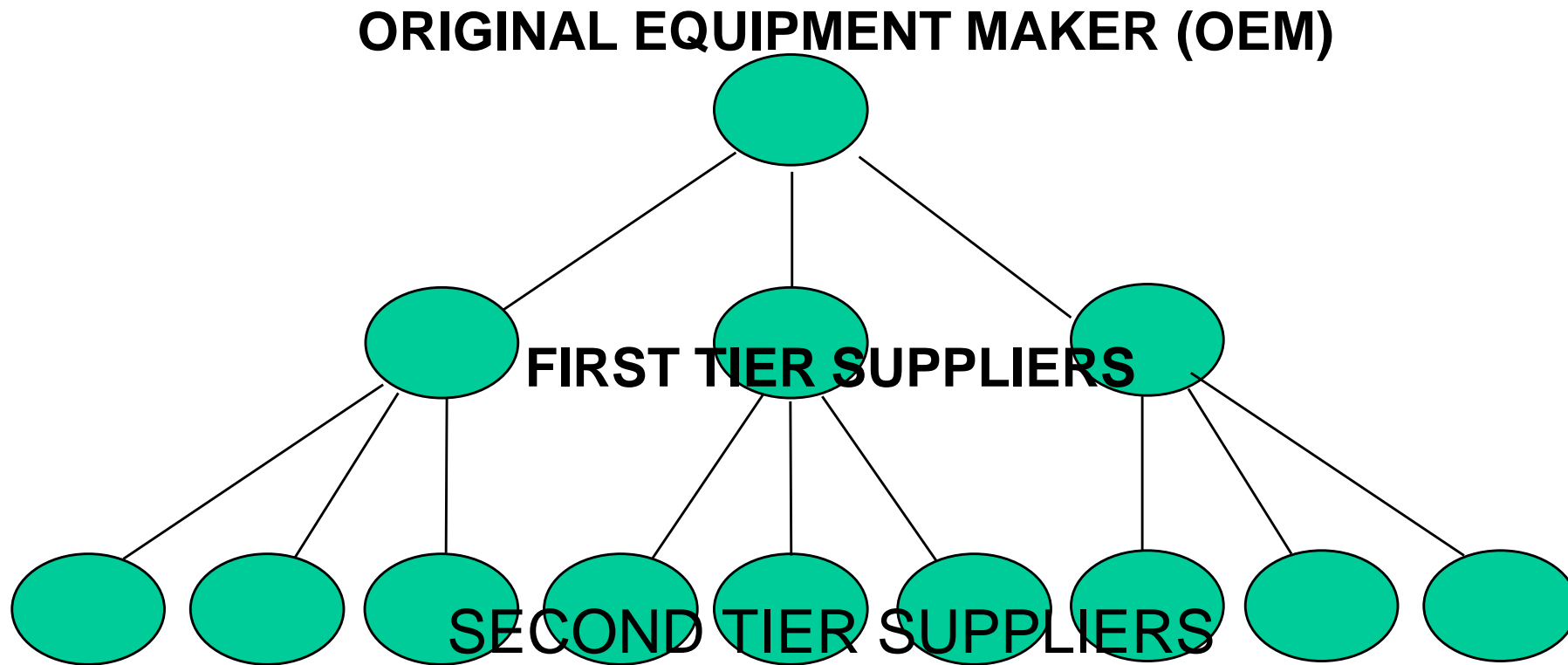
- Supplier tiering

As is obvious from the name, this approach to supply base management consists of organising supply through different layers, with the immediate or direct suppliers being known as the first tier.

The main aim is to have an optimum number of suppliers who will be directly dealing with the buying organisation, termed as the Original Equipment Maker (OEM)

The further the tier a supplier belongs to, the lesser the influence the supplier has over the OEM.

# SUPPLY BASE MANAGEMENT (Cont.)



# SUPPLY BASE MANAGEMENT (Cont.)

- The role of the first tier suppliers

It is, perhaps, misleading to call the first tier companies merely suppliers. Supply is what they do of course, but as key vendors they work very closely indeed with the OEM, collaborating in a great variety of ways, and becoming risk and benefit sharing partners in the OEM's business.

- ✓ Be committed to a long term relationship with the OEM
- ✓ Understand and share OEM's Mission
- ✓ Spend on dedicated assets
- ✓ Transparency in the relationship
- ✓ Contribution to design & specification
- ✓ Manage second tier
- ✓ Relationship between partners (other tiers)
- ✓ Disseminators of understanding to tier 2
- ✓ Share in quest for efficiency by negotiating cost removal rather than allocation

# SUPPLY BASE MANAGEMENT (Cont.)

- Sourcing implications of supplier tiering
  - ✓ The sourcing, selection and contracting of the first-tier suppliers will be a crucial strategic exercise.

It should involve all key stakeholders (senior management, procurement and user departments/functions).

Adequate resources and finances must be fully dedicated towards comprehensive appraisal, selection and negotiation processes.

- ✓ There will be fewer commercial relationships to manage, so resources can be directed to managing, developing and improving these key relationships.

# SUPPLY BASE MANAGEMENT (Cont.)

- ✓ The top-tier organization will still need to 'drill down' through the tiers in the supply chain.

Appraising and monitoring policies, systems and performance to ensure that the first tier's supply chain is being well managed. Issues to be monitoring can be risk management; ethical, environmental and labour standards; quality assurance, etc.

- ✓ The buyer may exercise influence over the first-tier supplier to adopt some of its own existing suppliers as subcontractors or lower-tier suppliers.
- ✓ More and better supply chain improvements and innovations may be available from sharing information and collaborating with expert first-tier suppliers
- ✓ Procurement may be freed up to pursue a more strategic focus and contribution