### Adverse selection

Pre-contractual opportunism arising when one party to a bargain has private information about something affecting the other party's net benefit from the contract, and when only those whose private information implies that the contract will be especially disadvantageous for the other party accept a contract.

### Agency costs

A general name given to the contract costs involved in disciplining the behaviour of some party acting on your behalf.

### Agency relationship

A relationship in which one person (the agent) acts on behalf of another (the principal).

#### Agent

A person acting on behalf of another.

### Alienable property rights

Private property rights which can be transferred (sold or given) to other individuals.

### Allocation

A complete specification of how resources are to be used.

### Allocative efficiency

The economy's ability to produce the quantities of the goods and services consumers desire to buy.

### **Architecture**

A decision procedure aggregating individual decisions into an organization decision.

### Asset

An investment giving rise to a potential future cash flow.

### Asset specificity

The degree to which a resource is committed to a specific task and thus cannot be redeployed to alternative uses without a substantial reduction in its value.

## Asymmetric information

The position where one party to a transaction has superior information compared with another party.

### **Authority relation**

A situation in which one party (the superior) has the right to direct the behaviour of the other (the subordinate), at least within bounds, and to supervise, monitor and punish or reward the subordinate.

## **Backward integration**

Bringing the supply of an input under the ownership and management of the input purchaser. Also called upstream integration.

### **Bankruptcy**

A set of legal provisions designed to come into effect when a firm or individual is unable to meet debt obligations.

### **Bargaining costs**

The transaction costs involved in negotiations between or among different parties. These include the time spent on bargaining, resources expended during bargaining or in trying to improve bargaining position, and any losses incurred as a result of failure or delay in reaching otherwise efficient agreements.

### Barriers to entry

Anything, either physical, institutional or the result of some decision process making it prohibitive for new firms to enter a market.

### Behavioural finance

An approach incorporating psychological aspects in the analysis of financial markets.

### **Bertrand competition**

Position when the competition between two or more firms is characterized by each firm assuming that its rival or rivals' price or prices are fixed and then deciding how to set its own.

### **Board of directors**

Shareholder-elected officials who act in the interest of the owners in a corporation's internal control mechanism.

### **Bounded rationality**

The ratio of the cognitive capacities of the decision-maker to the complexity of the problem.

## Brand name capital

A firm's reputation for quality products or living up to its end of a contract; the firm can receive more favourable terms from contracting parties because it is a more desirable partner.

### Brand name capital specificity

A form of asset specificity whereby a firm becomes linked to a well-known brand name and thus less free to pursue other opportunities.

## **Business strategy**

Strategy at the business unit level.

## Capital structure

The mix of debt and equity financing chosen by a firm.

### Cash flow

Accounting net income plus any allowances for depreciation.

### Certainty equivalent

Certain income an individual considers equivalent to an activity with risky payoffs.

### **CEO**

Chief executive officer, the highest-ranking officer in a corporation.

### Coase theorem

A proposition that if there are no wealth effects and no significant transaction costs, then the outcome of bargaining or contracting is independent of the initial assignment of ownership, wealth and property rights and is determined solely by efficiency.

### Coefficient of absolute risk aversion

A measure of the risk attitude of an individual.

### **Collateral**

Tangible assets pledged by a borrower as security in case of default or inability to repay a loan.

#### Commitment

Determination or promise to follow a particular course of action.

### Comparative advantage

Position where one party can produce a good relatively more efficiently (in terms of the opportunity cost) than other parties.

## Comparative performance evaluation

The practice of evaluating an individual's performance by comparing it with the performance of others doing similar work.

## Comparative statics

The comparison of two different equilibrium points.

### Competitive market

Market structure in which no buyer or seller has market power.

### Complementarity

Position where doing more of one activity increases the return to doing more of the other activity.

### Complements

A set of activities with the property that doing more of any subgroup of the activities raises the marginal return to the other activities.

## Complete contract

A contract specifying exactly what is expected of each party under all observable possible future contingencies.

### Complete contingent contract

A contract specifying exactly what is expected of each party under all possible future contingencies.

## Complete market

A hypothetical set of markets, one for each possible commodity at each future date and for each possible realization of the uncertainty in the world.

## Complete rationality

Position where the cognitive capacities of a decision-maker are sufficient to grasp all aspects of a problem.

## Consumer surplus

The difference between what final users are willing to pay for a good and what they actually pay.

## Contract

Formally, contracts are legally enforceable promises. They may be oral or written, and they typically must involve obligations on each party.

### Contract curve

The locus of points in a production Edgeworth box which represent tangencies of each firm's isoquants at the prevailing input price ratio.

### **Contracting costs**

The out-of-pocket and opportunity costs of negotiating, drafting and enforcing contracts; they include search and information costs, and the efficiency losses which result because incentive conflicts are not completely resolved.

### **Co-ordination costs**

A broad category of costs entailing the determination of prices, the costs of acquiring information concerning the location, quality, reputation and availability of different parties, and other costs associated with allocating workers to specific tasks and with bringing transaction participants together.

### Co-ordination problem

A situation with more than one Nash equilibrium.

### Core competencies

A form of economy of scope which arises out of a firm's ability to carry out some types of activities as well. Typically, this refers to the firm's ability to design, make, sell or distribute a certain kind of product.

### Corporate culture

The set of explicit and implicit expectation of behaviour within the firm; it usually encompasses the ways work and authority are organized, the ways people are rewarded and controlled, as well as organizational features such as customs, taboos, company slogans, heroes and social rituals.

### Corporate governance

The allocation of decision and income rights regarding assets.

## Corporate strategy

Strategy at the firm level, i.e. the determination of which business activities the firm will undertake.

## Corporation

An organizational form which allows the enterprise to act as a legal entity separate from its owners, who enjoy limited liability for the corporation's debts.

### **Cost-plus pricing**

Pricing policy where firms set prices by marking up average total cost by an amount designed to yield a target rate of return.

### Cournot competition

A situation where the competition between two or more firms is characterized by each firm assuming that the quantity produced by each of its rivals is fixed and then deciding how to set its price.

## Covariance

A measure of the extent to which the realizations of two random variables are linked. Calculated as the expected value of the product of the deviations of the variables from their means.

### Credibility

The plausibility of claims or promises.

### Deadweight loss

The area of consumer and producer surplus lost because of the presence of monopoly power.

### Debt

A form of finance requiring regular payments, where control by the providers of the loan is contingent on the honouring of the regular payments.

### **Decision right**

The authority to decide how assets will be used.

### **Dedicated assets**

Assets whose purchase is necessitated by the requirements of one or only a few buyers.

### **Deductive rationality**

Logical, top-down approach to modelling bounded rationality.

### Delegation

The shifting of control rights to local decision units.

### Diamond-water paradox

The observation that the price of diamonds is much higher than the price of water, while water is essential for life whereas diamonds are not.

### Diminishing marginal productivity

A generally accepted theory in economics stating that the marginal product of an input to the production process eventually declines as more units of that input are added to the production process.

### Diversification

For an individual investor, the division of invested wealth among a variety of different assets. For a firm, the operation in several different lines of business.

## Division of labour

The separation of tasks into a large number of different component activities.

## **Double marginalization**

Increments in the product's price above marginal costs first by the manufacturer and then by the distributor when decentralized pricing decisions are made. The combined profits increase when the intermediate product price is lowered.

## Downstream

An activity following the reference activity in the sequence of steps from producing raw materials to delivering a finished product to the customer.

## Economic rent

The benefit from an activity going to a resource in excess of what is needed to attract that resource to that activity.

## **Economies of scale**

The reduction in average cost achievable when a single product is made in large quantities.

## Economies of scope

The reduction in total cost achievable when a group of products are all made by a single firm, rather than being made in the same amounts by a set of independent firms.

## **Edgeworth box**

A graphical depiction of the total amount of two factors of production going into the production of two outputs.

## Efficiency wage

A wage higher than is required to attract and hold workers to a particular employment, the higher pay being designed to induce higher productivity.

### Efficiency wage model

A working hypothesis attempting to explain compensation patterns in labour markets; especially useful because it addresses measurement costs and predicts that managers will reward good behaviour by workers with economic rents.

### **Efficient**

An allocation, contract or organization is efficient if there is no feasible alternative one which everyone finds to be at least as good and which at least one person strictly prefers.

## Efficient markets hypothesis

The hypothesis that prices in securities markets, and particularly stock markets, fully and accurately reflect all information relevant to forecasting future returns.

### **Employee-owned firm**

A firm in which the providers of labour services hold a controlling interest.

### **Endowment**

The amounts of various goods owned initially, before trade opens.

### Entry barrier

Some device keeping other sellers from freely entering a market, including economies of scale and scope, control of a key resource or location, or a patent or copyright.

### Equal compensation principle

The principle in incentive contracting that if an agent is to allocate effort among different activities, then each must bring the same marginal return to effort. Otherwise, the agent will focus exclusively on the one yielding the greatest impact on his or her income.

### Equilibrium

A stable situation where no party has a reason to change its strategy.

### Equity

Securities issued by a firm which represent ownership rights (such as stocks) or are convertible into such securities (such as warrants).

### Equity premium puzzle

The empirical observation that the return on equity has been significantly higher than the return on bonds.

### **Evolutionary economics**

A theory of economic organization and industrial structure which focuses on change. The primary assumptions are that (1) firms satisfy rather than maximize, relying on routines and decision rules in doing so, (2) the competitive environment rewards success and (3) any industry is not likely to be in equilibrium at any point in time.

### Ex ante

A Latin phrase meaning roughly 'before the fact'.

### Evit

A firm leaving the industry.

## **Exploitation**

Doing better in the same domain.

### **Exploration**

Striving to find completely novel ways of doing things.

### Ex post

A Latin phrase meaning roughly 'after the fact'.

### **Extensive form**

The representation of a non-cooperative game by a tree diagram, where the nodes represent the players and the sequence of decisions, the branches their available actions, ovals the information structure and the payoffs each player stands to earn from each possible combination of actions.

#### Externalities

The costs or benefits from the actions of one party which affect the utility or production possibilities of another party.

### Fat Cat strategy

Overinvestment in order to create a passive profile.

### Firm-specific assets

Assets significantly more valuable in their current use within the firm than in their next best alternative use outside the firm.

### Firm-specific human capital

An employee's acquired skills and knowledge which have greater value in their current employing organization.

## First-mover advantage

Expected benefits gained by the party deciding first.

## Formal authority

The power coming from explicitly assigned decision rights within the organization.

## Forward integration

Bringing a downstream activity, such as distributing or selling a firm's product, under the ownership and management of the firm. Also called downstream integration.

## Franchise agreement

Contract between the franchiser (parent) and the franchisee granting the use of the parent's name.

### Free cash flow

The amount of a firm's cash flow in excess of what can be profitably invested in the firm.

## Free rider problem

A situation where each member of a team has an incentive to shirk because each receives the full benefit from shirking, but only bears a part of the costs.

## Fringe benefits

Components of the compensation package other than salary and incentive compensation. They are either in-kind or deferred (such as medical insurance and pensions).

### Functionally organized firm

A firm in which the traditional functions, such as accounting, sales, manufacturing, and so on, are each controlled by a separate department.

### Fundamental welfare theorem

The proposition that the allocation associated with a competitive equilibrium is efficient.

### **Game theory**

A mathematical tool for modelling multi-person decision situations.

### General equilibrium analysis

A method of enquiry which simultaneously determines the prices and quantities in all markets.

### General knowledge

Knowledge relatively inexpensive to transfer.

### Governance structure

The rules by which an exchange is administered. These rules are usually distinguished in decision rights and income rights.

### Group incentive pay

Reward scheme basing employee compensation on group performance.

### Hard investment

Investment characterized by a negative relationship between the level of investment of the incumbent and the profit level of the entrant.

### Hierarchy

Architecture in which a proposal is accepted only when everybody accepts it.

## Holding company

A company which owns several other companies but exercises little or no management control over them.

## Hold-up

Ex-post opportunism with respect to contractual agreements regarding assets.

## Hold-up problem

Inefficient investment due to the anticipation of hold-up.

### Horizon problem

A potential mismatch between the planning horizon of the decision-maker and those affected by his or her decision.

## Human asset specificity

A situation obtaining where individuals develop skills with narrow applications.

## Human capital

The acquired skills and knowledge which make an individual more productive.

## Hysteresis

Past behaviour determining future behaviour to a large extent.

### Imperfect commitment

Parties' limited abilities to bind themselves to future courses of action.

### Imperfect information

The less than complete or accurate data held by at least one buyer or seller.

### Implicit contracts

An agreement consisting of promises and shared understandings which are not expressed by formal legal documents but which the parties consider to be binding on one another's conduct.

## Inalienability problem

A difficulty occurring in organizations where the net benefits from a business relationship cannot be sold by those currently holding the rights to those benefits.

## Incentive compatibility constraint

Limitations on the set of contracts which can be implemented, arising from the necessity of giving individuals appropriate incentives to induce them to adopt the desired course of action.

### Incentive intensity principle

The principle in incentive contracting that the intensity of incentives should increase with the marginal productivity of effort and with the agent's ability to respond to incentives, and should decrease with the agent's risk aversion and the variance with which performance is measured.

### **Incentive problem**

A situation where the parties have conflicting interests.

### Income right

The way revenues and costs of the deployment of an asset are distributed.

## **Incomplete contracts**

Agreements which fail fully to specify actions under every course of events.

## Indifference curve

A depiction of all combinations of goods or services which yield the same utility.

### **Inductive rationality**

Bottom-up approach to modelling bounded rationality.

### Influence activities

Activities aimed at changing organizational decisions to allow interested parties to capture organizational rents.

### Influence costs

The costs associated with influence activities.

### Informal authority

Formal authority delegated to a local decision unit.

## Informational asymmetry

A situation where the amount and/or quality of data held by parties to an exchange differs, or is believed to differ.

### Informational rent

A return in excess of opportunity costs which accrues by virtue of an individual having private information.

### Information cascade

The choices of a few early individuals determining the choices of all successors.

### Informativeness principle

The principle of incentive contracting which holds that payments under a contract should depend on the value of a variable if and only if accounting for that variable allows a reduction in the error with which performance is measured.

### Intensity of incentives

The rate at which expected income changes with improved performance under an incentive contract.

### **Internal labour markets**

A complex of administrative procedures and rules governing the allocation of labour, investments in it and its compensation within an organization.

#### Investment

An expenditure of resources which creates an asset.

### Irreversible investment

Investment with no alternative use or resale value.

### Joint venture

Enterprise owned by two or more independent firms.

### Just-in-time manufacturing

A production system in which inventories of goods in process are minimized because the required inputs to each stage of manufacturing are delivered to each work station just as they are needed.

### Keiretsu

A network organization employed in Japan. It consists of an affiliation of quasi-independent firms with ongoing, fluid relationships, where the firms typically have cross-holdings in each other's common stock.

## Law of comparative advantages

The rule that the total output (production) of a group (persons, companies, countries) is largest when each good or service is produced by the person with the lowest opportunity costs (the comparative advantage).

## Law of demand

The rule that the quantity demanded varies inversely with price.

## Law of diminishing returns

The rule that the marginal product of a variable factor will eventually decline as the use of the factor is increased.

### Law of large numbers

The statistical tendency that the uncertainty regarding the average of a sample reduces when the sample becomes larger.

## Law of small numbers

A phrase referring to the representativeness of a small sample being used in the wrong way.

## Lean and hungry strategy

Underinvestment in order to create an aggressive profile.

## Learning curve

The path of declining unit cost for new products as a manufacturer learns to overcome initial problems.

### Licence

A fixed amount of money paid for renting an asset.

### Limited liability

The condition of a person whose liability for the debts of a partnership or other organization is limited to the amount of capital he or she has invested.

### Limited partner

A partner in a limited partnership who supplies financing and enjoys a share of the partnership profits but who exercises no control of partnership decisions and who has limited liability for partnership debts.

### Limited partnerships

A partnership consisting of both general partners and limited partners.

### Limited rationality

A situation when the cognitive capacities of a decision-maker are insufficient to grasp all aspects of a problem.

### Loss aversion

The asymmetric valuation of gains and losses by a person, where the negative impact on the level of utility of a loss is larger than the positive impact of a gain.

### Make-or-buy decision

The choice a firm must make about whether it should make an intermediate good in-house or secure it in some market.

## Marginal analysis

An approach considering only the incremental costs and benefits in making a decision.

### **Marginal** cost

The increase in the total costs of production resulting from raising output by one unit.

### Marginal product

The change in total product, or output, resulting from the use of one more unit of a variable factor, other things being equal.

## Marginal revenue

The change in total revenue resulting from the sale of one more unit of output.

## Market

The interaction of one or more independent buyers with one or more independent sellers.

### Market clearing price

Price at which the quantity supplied of a product is equal to the quantity demanded.

## Market discipline

Market punishment for 'bad' behaviour, i.e. when enough buyers (sellers) having learnt of a particular seller's (buyer's) poor behaviour act together to curtail that seller's (buyer's) activities.

### Market failure

The inability of markets to achieve efficient allocations when economies of scale, externalities or missing markets are involved.

### Market power

The ability of a buyer or a seller to influence the market price by his or her actions.

#### Market structure

The basic characteristics of the market environment, including (1) the number and size of buyers, sellers and potential entrants, (2) the degree of product differentiation, (3) the amount and cost of information about product price and quality, and (4) the conditions for entry and exit.

### Marketing co-operative

Forward integration by many small farmers into the next stage of production.

### Measurement costs

The costs involved in determining the quality of a good or service which a party incurs to improve its bargaining position.

### Menu of contracts

A system for compensation in which individual employees may choose which of several different formulas will be used to compute their pay.

### Modigliani-Miller theorem

The proposition that the total market value of a firm is independent of how the firm is financed in terms of debt and equity.

## Monitoring

An activity aimed at determining whether the contractual obligations of another party have been met.

## Monitoring intensity principle

The principle of incentive contracting that indicates that more resources should be used to reduce the errors in measuring performance when stronger performance incentives are being given.

### Monopoly

A market structure in which there is a single seller.

### Moore environment

The neighbourhood of a unit in a grid consisting of the horizontal and vertical neighbours.

### Moral hazard

The post-contractual opportunism arising when actions required or desired under the contract are not observable.

## **Multidivisional form**

The organization of the firm into a collection of business units based on factors such as product or geographic area with autonomy to make day-to-day operating decisions and with control over their own functional departments (accounting, marketing, etc.).

### Nash equilibrium

A specification of a payoff-maximizing strategy for each player, given the strategies of the other players.

### Nexus of contracts

The identification of the firm as a connected group of (explicit or implicit) contractual relationships among suppliers, customers and workers.

## Non-cooperative game theory

A branch of game theory in which agreements are not binding.

### Non-specific assets

Assets which are equally useful when employed in combination with any of various other assets or in any of several different relationships.

### No wealth effects

The condition on preferences which means that choices among non-monetary alternatives are unaffected by the individual's wealth or income.

## Oligopoly

Market with a few (large) competitors who take each other's reactions into account.

### Opportunism

The policy of taking advantage of a situation in the pursuit of self-interest.

### Opportunistic behaviour

Self-interested behaviour with guile.

### Opportunity cost

The value of any resource in its next-best alternative use.

### Outsourcing

Moving an activity outside the firm which formerly was done within the firm.

### Ownership

The right to decide by whom, how, when, for how long and under what conditions an asset will be used.

## Pareto efficiency

A position where there is no feasible alternative which keeps all individuals at least as well off but makes at least one person better off.

### Participation constraints

Limitations on contracts or other organizational arrangements arising from the fact that participation is voluntary and so individuals must expect to do at least as well as under their next-best alternatives or they will refuse to participate.

### Partnership

A form of organization in which some or all of the multiple owners, the general partners, accept unlimited liability for the organization's debts and exercise management control.

## Path dependency

Where past behaviour determines future behaviour to a large extent.

### Perfect capital markets

A theoretical ideal in which all individuals can borrow and save on the same terms, the terms being unaffected by the amounts involved.

### Perfect competition

An arrangement of buyers and sellers in which there is perfect information, a homogeneous product, similar firms and free entry and exit.

## Perfect information

A situation where every participant (and potential participant) in a market becomes aware of every price, product specification and buyer and seller location at no cost.

### Physical asset specificity

A particular investment in machinery or equipment which has one narrowly defined purpose.

## Piece-rate rewards

A reward system which compensates people in proportion to the amounts they produce.

### **Polyarchy**

Architecture in which a proposal is rejected only when everybody rejects it.

### Pooling equilibrium

A situation where agents with different characteristics (utility functions, preferences, payoffs) choose the same contract.

### Postcontractual opportunism

Opportunistic behaviour by a party after a contract is signed.

### **Procedural rationality**

A situation where the cognitive capacities of a decision-maker are hardly able to grasp any aspect of a problem.

### Puppy Dog strategy

Underinvestment in order to create a passive profile.

### Precontractual opportunism

Opportunistic behaviour by a party before a contract is signed.

## Preferred shares (stock)

Shares with priority dividend claims but no voting rights.

## Price discrimination

Charging different prices for highly similar goods.

### Principal-agent model

A model employed to examine incentive problems among contracting parties.

## Principal-agent problem

A problem created by the separation of ownership and control in various transactions.

### Prisoners dilemma game

A classic example of the tension between group interest and individual self-interest, where individual (selfish) interest leads to the worst possible outcome for all.

## **Produces surplus**

The difference between the minimum amount the seller will accept for any given unit sold and its actual price.

### **Product attributes**

The various characteristics of a product buyers value.

### Product life cycle

The pattern introduction, growth, maturity and decline in the demand for products over their life cycles.

### **Production function**

Specification of the maximum feasible output which can be produced for given quantities of inputs.

### Production possibilities frontier

The combination of goods an economy can produce by fully utilizing all of its resources including technology.

### **Profit centres**

Business units whose managers are given decision rights for input mix, product mix and selling prices (or output quantities) and are asked to maximize profits given a fixed capital budget.

## Property right

An enforceable right to select the uses of a good.

### **Public corporation**

A corporation whose shares are bought and sold through an organized exchange and so may be held by any investor.

### **Quality circles**

Voluntary work groups meeting regularly to discuss how to improve the quality of products and work processes.

### Quasi-surplus

The value of an investment minus its recoverable costs.

### Ratchet effect

The tendency of performance standards in an incentive system to be adjusted upwards after a particularly good performance, thereby penalizing good current performance by making it harder to earn future incentive bonuses.

### Rationality

The principle that individuals and firms act in a consistent manner.

### **Reaction function**

Specification of a payoff-maximizing strategy of a firm for each possible choice of the other firm(s).

## Relational contract

A contract which specifies only the general terms and objectives of a relationship and specifies mechanisms for decision-making and dispute resolution.

### Relative performance evaluation

Measurement of employees' performances relative to those of their peers.

### Renege

Deliberately choose not to carry out a promise or contract to the detriment of the other party.

### Renegotiate

Bargain to determine new terms to replace those of an existing contract. If no new agreement is reached, the previous one remains in force.

### Rent

Return from an activity above the minimum required to attract resources to that activity.

## Rent-seeking behaviour

An attempt by some interested party to alter the allocation of rents in a contractual agreement.

### Repeated relationship

A situation where two parties expect to interact with each other over time.

### Reputation

The view formed of an individual or organization by another based on past experience, especially as a basis for forecasting future behaviour.

### Reservation price

The maximum price the buyer is willing to pay, or the minimum the seller is willing to accept.

### Reservation utility

The utility the employee can obtain in the next best alternative.

### Residual claimants

Persons who have the legal rights to the profits of the enterprise once the fixed claimants of the firm (for example, bondholders and employees) are paid.

### Residual return

The income from an asset or business which remains after all fixed obligations are met.

### Residual right

The right to make any decision concerning an asset's use which is not explicitly assigned by law or contract to another party.

### Revelation principle

The principle holding that any outcome which can be achieved by some mechanism under the self-interested strategic behaviour which is induced by the mechanism can also be achieved by a mechanism employing a mediator to whom the parties willingly report truthfully and who then implements the outcome which would have resulted from the original mechanism.

### Risk-averse individual

An individual preferring the deal with the lower level of uncertainty or risk-holding when both deals have equal expected value.

## Risk neutrality

The characteristic of a person who is indifferent between receiving a fixed sum of money or a risky prospect with an expected value equal to the fixed sum.

### Risk-neutral individual

An individual caring only about expected value and indifferent to the level of risk.

## Risk premium

The difference between the expected value of a risky income stream and its certainty equivalent.

### Royalty

A fixed amount of money received or paid for each unit sold.

### Routines

Standardized rules for decision and action that, although they may vary to a limited degree with the particular circumstances, are applied across a period of time without further fine-tuning.

## Schema theorem

A theorem stating that well-functioning compact clusters, patterns or modules will grow exponentially in number in the population of patterns in evolutionary environments.

### Screening

A potential solution to adverse selection which occurs when the uninformed parties to a contract undertake activities to cause the informed parties to distinguish between themselves with respect to some unobservable characteristics.

### Segregation

Situation where the population of a neighbourhood is homogeneous.

### Selective intervention

The management practice of allowing divisions or businesses to operate with nearly complete independence, intervening only to correct particular problems.

### **Self-organization**

The tendency in computer simulations for locally interacting units to form surprisingly complex patterns in a relatively short period of time.

### **Self-selection**

A situation where people with different personal characteristics identify themselves to outsiders by choosing contracts which best fit with their private information.

## Separating equilibrium

A situation where agents with different characteristics (utility functions, preferences, payoffs) choose different contracts.

### Separation of ownership and control

A property of publicly held corporations that one group of shareholders owns the firm and a second group of managers runs the firm, i.e. the residual returns and residual rights of control belong to different parties.

## Shirking

A form of ex-post opportunistic behaviour arising because of imperfect monitoring, i.e. where one party puts in less effort than it otherwise might if its actions were perfectly observable.

### Short run

The operating period during which at least one input (frequently capital) is fixed in supply.

## Signalling

A potential solution to adverse selection occurring when the informed parties to a contract undertake activities to distinguish between themselves with respect to some unobservable characteristics.

### Site specificity

A situation where an asset is located in a particular place such that it is useful only to a small number of buyers or suppliers and it cannot be moved easily.

### Soft investment

Investment characterized by a positive relationship between the level of investment of the incumbent and the profit level of the entrant.

### **Specialization**

The process of narrowing (and, presumably, deepening) the range of tasks a particular individual or machine can perform.

## Specific asset

An asset worth more in its current use than in alternative uses.

## Specific human capital

Skills acquired by an individual and expected to be useful only within a specific contractual relationship.

### Specific investment

An investment creating a specific asset.

### Specific knowledge

Knowledge relatively expensive to transfer.

### Specific rights

Delineation of the rights and duties in circumstances which are verifiable.

### Specific skills

Skills relevant only in some particular job or organization.

### **Specificity**

The extent to which assets are specific.

### Spot market

A market in which exchange is made immediately at the current market price with no long-term commitment between buyer and seller.

### Spot market contract

A contract for the immediate exchange of goods or services at current prices.

### Stakeholder

Any individual or group with a direct interest in a firm's continuing profitable operations (including stockholders, lenders, employees, customers, suppliers, communities where the firm employs workers, and so on).

## Strategic behaviour

One party's choices not only affects other parties, but these choices also affect the choices made by the other parties.

### Strategic complement

A strategic variable with a negatively sloping reaction function.

### Strategic form

The representation of a non-cooperative game by a matrix with the strategies of the players as horizontal and vertical entries, and the payoffs which each player stands to earn from each possible combination of strategies.

## Strategic misrepresentation

A situation in which one party may try to benefit by reporting which is less than truthful.

## Strategic substitute

A strategic variable with a positively sloping reaction function.

## Strategic variable

Where one party's choices affect not only other parties, but also the choices made by the other parties.

### Strategy

Specification of an action for each observable history of the game.

### Subjective performance evaluation

An evaluation based on the personal opinion of the supervisor rather than on some objective measure (such as the quantity of output).

### Substitute product

A good competing with another good, i.e. if the price of one good is increased, the consumer will tend to shift purchases to the other one.

### Sunk costs

Non-recoverable costs already incurred, the resources having no alternative use.

### Supply curve

A line on a graph displaying the quantity producers are willing to sell at each price, holding all other factors affecting producer behaviour constant.

### Survival of the fittest

Principle of economic Darwinism stating that companies have the greatest chance of survival if they are organized efficiently given their particular environment.

### Synergy

A situation where the combined effect of two activities is greater than their sum taken separately.

### **Tacit collusion**

Collusion without explicit communication or agreement.

### Team production

A production process in which the individual outputs cannot be separately identified.

### Tenure

The condition of being protected from termination of employment in a job, regardless of general performance, subject only to meeting certain minimal standards of acceptable behaviour.

### Time inconsistency

Short-run behaviour which is not compatible with the long-term interest.

### Top Dog strategy

Overinvestment in order to create an aggressive profile.

### Total revenue

Price times quantity.

### **Tournament**

A contest in which the prices received depend only on ordinal ranking (first, second, third, etc.) and not on absolute performance.

## Transaction

The largest unit of economic activity which cannot be subdivided and performed by several different people.

### **Transaction costs**

The costs of carrying out a transaction, or the opportunity costs incurred when an efficiency-enhancing transaction is not realized.

### **Transfer prices**

The prices used for transactions among departments or divisions within a firm.

### Transition rule

A rule describing the transition from one state to another state.

#### Trus

The belief in a partner's honesty or goodwill.

### Type I error

The probability of rejecting a good project.

## Type II error

The probability of accepting a bad project.

### **Unlimited liability**

The condition of a person whose liability for the debts of a partnership or other organization is not limited to the amount of capital that person has invested.

### Upstream

An activity preceding the reference activity in the sequence of steps from producing raw materials from natural resources to delivering a finished product to the customer.

### Utility

An index of personal well-being.

## **Utility function**

A numerical representation of an individual's preferences over different possible choices or situations.

## Vertical chain of production

The series of steps in the production process.

## Vertical integration

Bringing either one of the input sources or one of the output buyers of the firm under common ownership and management.

## Von Neuman environment

The neighbourhood of a unit in a grid, consisting of the horizontally, vertically and diagonally adjacent cells.

### Wealth effects

The variation in the amount a consumer is willing to pay for some object or in the quantity which the consumer may wish to buy at a particular price as a result of a change in his or her wealth.