

# Chapter 1

## The social basis of medicine

No man is an island, entire of itself; every man is a piece of the continent, a part of the main. If a clod be washed away by the sea, Europe is the less, as well as if a promontory were, as well as if a manor of thy friend's or of thine own were. Any man's death diminishes me, because I am involved in mankind; and therefore never send to know for whom the bell tolls; it tolls for thee.

John Donne (1572–1631) *Meditation XVII* (extract)

### Introduction

There is more to medicine than the basic sciences if one is to practise as a competent and humane physician. Effective patient care involves an appreciation not only of the biological but also of the psychological and social dimensions of every case. This biopsychosocial approach has become the 'gold standard' in medical practice and is the foundation of this book. It is fundamental to the practice of integrative medicine and whole-person care.

In order to practise using the biopsychosocial model, it is useful to view medicine as part of a wider health system. In some ways, the part medicine has to play, while vital, is small compared to what goes on in the three sectors of health care as a whole. Yet the influence of medicine in society is increasing, and the growing infiltration of medical knowledge and practice into domains

that were previously not part of its remit is indicative of what is known as the medicalization of society. Conversely, medicine is imbued with the values of the society within which it is practised and is accountable to it. This is the socialization of medicine.

#### This chapter covers the following topics

- The biopsychosocial approach in clinical practice
- Integrative medicine and whole-person care
- What is a health system?
- The three sectors of health care
- The medicalization of society
- Demedicalization
- The socialization of medicine

### The biopsychosocial approach in clinical practice

Table 1.1 illustrates how the biopsychosocial approach can be used to understand the health problems of an individual or group. The three components of the biopsychosocial model of health and health care are the biological, the

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**Table 1.1** The biopsychosocial model.

BIO	PSYCHO	SOCIAL
Genetic factors	Loneliness	Poverty
Body system function (e.g. immune system)	Self-esteem Power and control	Access to resources (e.g. healthy food) Living conditions (e.g. danger and stress at work or home) Discrimination

**Table 1.2** The biomedical and biopsychosocial models compared.

Biomedical model	Biopsychosocial model
Body as biological	Body as biological and psychosocial
Biological processes separate from psychological and social processes	Biological, psychological and social processes intimately related
Disease or physical disorders can be explained by disturbances in physiological processes, e.g. injury, biochemical imbalances, infections	Illness can be explained by challenges to the whole person, a combination of biological, psychological and social factors
Disease requires specific treatment	Person requires individual treatment
Emphasis on cure	Emphasis on care

psychological and the social. They interact to affect the health of the individual or group. In any health care activity, it is necessary to take all three into account if care is to be provided that is sensitive to the ‘whole person’. Of the three components, this book focuses on the social and psychological. Taking a psychological and social view not only assists our understanding of patients, it is also invaluable in working effectively with other members of the health team, and in appreciating the social, cultural and behavioural determinants of health and disease in general.

One way of conceptualizing the whole person in a biopsychosocial way is by means of a hierarchy of systems.

**Hierarchy of systems in the biopsychosocial model**

- Society
- Culture
- Community
- Family
- Person
- Organs/organ systems
- Tissues
- Cells
- Genes
- Molecules

These ten systems are interrelated, in that an individual ‘case’ will encapsulate all of them. By ‘society’ what is meant is the structure and organization of everyday life, which corresponds also to a definition of the ‘social’, and by culture we mean the beliefs, attitudes and behaviours of groups and individuals, which correspond to a definition of ‘cultural’. In focusing on the psychological and social aspects of the model, this book focuses on the hierarchy from ‘person’ upwards.

The biopsychosocial model of health and illness is often contrasted with the biomedical model of disease (Table 1.2).

Doctors are taught during their training to single out disease as an organic pathology (diagnosis) from the story (‘history’) of the illness experience of the sick. Because biomedicine is unique in that it grounds its knowledge in materialism (in a realm of ‘facts’), it has a tendency to detach the facts of bodily function and disease from their social and cultural context. A sick person, then, may find themselves reconstrued as a body, a case, a patient or a cadaver, rather than as a ‘person’. However, the distinction between the biomedical and biopsychosocial approaches is confusing, since few good doctors use only a biomedical approach in modern medicine. What the biopsychosocial approach does is expand the biomedical

view by adding psychological and social factors to biological ones as needful of consideration.

### Integrative medicine and whole-person care

The biopsychosocial approach requires the practice of what is known as integrative medicine. Such an approach combines knowledge from the body systems and the social and behavioural systems that is used in an integrated way, for the purpose of what is known as ‘whole-person care’. For whole-person care to be effective, it requires not only that the medical practitioner integrates knowledge and information from diverse sources, but also that the medical services operate in an integrated manner with other health and social services – the health care team.

There are three main reasons why we need to understand how the psychosocial factors operate. First, practising medicine requires that we understand the social and cultural backgrounds of the patients we serve as well as those of their

carers, friends and families. People’s beliefs and practices with regard to health and illness vary widely, both within and between cultures. Taking these things into account is essential for *patient-centred* medicine, whether it is aimed at promoting good health or delivering effective health care.

Second, we need to understand the social and cultural basis of our own backgrounds and professional practice, as well as those of colleagues in other health care professions. This is the approach of the *reflective practitioner*, another gold standard of clinical practice. The beliefs and practices of the lay public may well differ from those of the health care professions, and the health care professions differ in turn in their approaches and philosophies.

Third, social, cultural and psychological factors contribute to explaining why ‘health’ is not evenly distributed in a particular locality, region, nation or the world in general. It is important that we take *health inequalities* into account if we are to apportion health care equitably and to devise solutions in both clinical and public health medicine that are of optimum benefit to those that need them.

#### Case study: The need for ‘whole-person care’

Entering your general practice one morning, you spot Mel, a 16-year-old girl with cystic fibrosis. Her eyes are puffy and it looks like she has recently been crying. She is overweight and seems to be inadequately dressed for the time of year. When you invite her into your consulting room she comes in, sits down and promptly bursts into tears. Her parents have been rowing, she says, and this morning her stepfather walked out. You talk through the difficulties she has been having and ask her if there is anything else that may be bothering her.

‘Yes’, she says, ‘I think I’m pregnant.’

How would a biopsychosocial approach help in dealing with Mel’s problems?

### What is a health system?

A health system may be defined as the sum total of the institutions and practices through which individuals, families, communities and society maintain and improve health and deal with ill health.

#### The components of a health system

- Institutions
  - formal
  - informal
- Activities
  - clinical practices
  - non-clinical practices
- Skills
- Knowledge
- Beliefs and attitudes

In the UK the National Health Service (NHS) is the major formal institution (it is the largest single employer in the UK) with responsibility for delivering health to the nation. An example of an informal institution is the household, an important venue for health-seeking behaviour among the general population. Clinical practice takes place in a variety of settings, but even more varied are the places in which non-clinical practices that affect health may be found. The skills required for a health system to function effectively are unevenly distributed within it. In general practice within the UK, for example, practice nurses are not allowed to prescribe drugs, but nurse practitioners can. Knowledge about health and illness is similarly unequally distributed. Finally, beliefs and attitudes permeate every aspect of health and health care. These institutions, practices, knowledge and beliefs are all interconnected. They cannot be understood in isolation from other aspects of society (e.g. social, religious, political and economic organization). In accordance with UK law, for example, particular kinds of knowledge and practice are concentrated in certain institutions (such as hospitals or acupuncture clinics) and not in others. The growth of interest and activities concerned with health in modern society has led to a meteoric expansion of organizations concerned with health and health care delivery.

The health system we have not only creates institutions, skills and knowledge within society, it also reflects the priorities and prejudices of society – for example, in our treatment of the elderly, mental as opposed to physical health care, and the division of labour by sex, class and ethnicity.

### The three sectors of health care

Three types of institutional arrangements for providing health care can be identified within any society, along a spectrum from informal to formal.

#### The three sectors of health care

Popular	Informal
Folk	
Professional	Formal

Most health care takes place in the *popular sector*, often without reference to a folk or professional healer. Estimates vary, but between 70% and 90% of all health care takes place in this sector, in both western and non-western societies. The popular sector is the focus of Chapter 3.

The *folk sector* is characterized in the UK by different types of complementary or alternative medicine. Some of these may also be ‘professional’ (e.g. homeopathy) or ‘professionalizing’. In India, for example, Ayurvedic medicine, which in the UK is generally regarded as a folk or alternative tradition, is part of mainstream medicine. In fact, students on medical courses in India often study a common foundation course before going on to specialize in either Ayurvedic or western biomedical (or allopathic) medicine. The folk sector is the subject matter of Chapter 5.

The *professional sector* includes all medical and paramedical groups and professionals. Each group has a different history and culture, reflected in different perceptions of health and ill health, forms of treatment, defined areas of competence, internal hierarchy, technical jargon and professional organizations. The professional sector is examined in Chapter 4.

These three sectors interact, both internally and with other systems, including the religious, economic and political systems operating in any society. Where these different institutions interact, *medical pluralism* exists. People’s decision-making with regard to different types of therapy – their health-seeking behaviour – is discussed in Chapter 2.

### The medicalization of society

The relationship between the three sectors is not static. In particular, the ‘professional’ sector, represented by modern medical practice, is increasingly pervasive in people’s lives (the ‘popular’ sector).

This increased influence is known as the medicalization of society, and resistance to it is marked by demedicalization. Probably what is happening is that the 'popular' and 'professional' sectors are becoming more integrated, with the medicalization of society paralleled by an increasing socialization of medicine.

### What is medicalization?

The process of defining an increasing number of life's problems as medical problems.

There are many areas of life in which medicine plays an increasingly prominent role; these include ageing, childbirth, alcohol and food consumption, and childhood behaviour. At the same time, medicine retains, or seeks to retain, absolute control over certain technical procedures, including prescribing, hysterectomy and abortion. There has also been an expansion of what in medicine is deemed relevant to the good practice of life, e.g. doctors being asked to comment as 'expert witnesses' in court cases on the mental state of defendants. This might be seen as the 'medicalization of deviance', where what were previously regarded as moral or social problems move into the medical domain (i.e. from 'bad' to 'sad'/'mad'). The increasing medicalization of society is often viewed negatively, but there are times when medicalizing behaviour as illness may be positive if it means that some form of treatment can be offered.

Women and children are particularly subject to medicalization. Areas in which medicalization can be observed for women include childbirth, menstruation and menstrual irregularities, new reproductive technologies (e.g. infertility treatments), new contraceptive technologies, premenstrual syndrome and hormone replacement therapy (HRT) during the menopause. Children are also likely to spend more time with health professionals, and to have far more monitoring, than they did in the past. Some children will be ascribed, and given treatments for, conditions previously undescribed or that are disputed, such as Attention Deficit Disorder (ADD) or Attention Deficit and Hyperactivity Disorder (ADHD).

### Medicalization is marked by increasing

- Levels of pharmaceutical consumption.
- Use of other medical technologies.
- Frequency of visits to medical settings.
- Range and extent of medical services.
- Risk of iatrogenic diseases.
- Influence of medicine in previously non-medical domains.
- Levels of health surveillance.
- Media coverage of health and medical matters.
- Risk of iatrogenic diseases.

### Increasing levels of pharmaceutical consumption

In any 24-hour period, about half the adult population of the UK are likely to consume a medically prescribed chemical. There is an increasing range of 'pills to pop', sometimes to treat problems that were previously regarded as non-medical (e.g. HRT for menopausal symptoms). If we add the products available without the need for prescription, medicalization through increased use of pharmaceutical products appears even more intense. The term 'cosmetic neurology' has been used to describe the use of drugs by otherwise healthy people to manipulate mood, memory, concentration, libido, capacity to learn and general ability to cope.

### Increasing use of other medical technologies

As well as pharmaceuticals, there has been a tremendous growth in other types of medical technology. For example, there are increasing numbers of aids for disabled people. More and more people are depending on medical technology of various kinds (e.g. asthma 'puffers' and nebulizers, contraceptive implants, kidney dialysis machines, oxygen cylinders, cardiac pacemakers, life-support machines). Through such means, the half-human, half-machine 'cyborg' of science fiction comes closer to reality.

### **Increasing frequency of visits to medical settings**

In the UK, in 1900 99% of births took place in the home. Eighty years later, this figure had reversed to 99% of births taking place in hospital. At the other end of life, increasing numbers of us are dying in hospital (see Chapter 13).

### **Increasing range and extent of medical services**

The range and extent of medical services are expanding. New specialisms have developed, among them occupational therapy, geriatric medicine and palliative care. The NHS is now the largest single employer in the UK with over one million employees and is one of the largest employers in the world. In fact, in just about every country in the world, the number of people working in the health field is growing.

### **Increasing influence of medicine in previously non-medical domains**

Doctors are expected to report to the authorities all diseases that carry the risk of mass infection, but also some conditions that don't (e.g. suicide attempts, gunshot wounds). New alliances – for example, between medicine and social workers, police, prison service, local authorities and other institutions that are concerned not only with welfare but also social control – are being formed. Medicine is infiltrating health and social care pathways that might previously have been outside its domain, in the provision of 'care in the community' for example, and in the work of 'health care teams'. The NHS is incorporating new areas into its remit, such as the increasing involvement of complementary practitioners in NHS-funded care. Doctors are also incorporating skills from other practitioners into their working methods, such as the use of counselling skills to deal with personal and social (rather than 'health') problems.

Doctors have also been at the forefront of various forms of social action (e.g. smoke free legislation). As well as their use by 'expert witnesses'

in jury trials and inquests, medical evidence and practice (particularly in the field of public health) are used to advance arguments and causes – e.g. the fluoridation of water supplies.

While medicine obviously desires its self-perpetuation, the strengthening and (perhaps) enlargement of its sphere of influence, much of the authority from which medicine derives its power comes from the faith and trust the general public place in it (see below).

### **Increasing levels of health surveillance**

Linked with the growing power of medicine is the rise in health surveillance as an increasingly normal part of everyday life in the West – another example of medicalization in action. Most women will, at some time, be asked when they last had a cervical smear test. Men similarly are under increasing surveillance for diseases such as prostate and testicular cancer. Babies and young children are the subject of numerous checks by health visitors, some of them in the home. More genetic tests (e.g. for breast cancer), and prenatal screening procedures (e.g. for Down's syndrome and spina bifida), may serve to heighten tension and anxiety among people who are the object of such tests.

### **Increasing media coverage of health and medical matters**

Coverage of health and medicine in the media (magazines, newspapers, TV, etc.) reflects a growing interest in health issues among the general public, which cannot be attributed to 'media hype' alone. The public are more likely to expect and bring pressure for their GP to 'do something' (i.e. offer some kind of medical intervention). Despite the recent scandals concerning mortality rates in the Bristol Royal Infirmary child cardiac unit, the case of Harold Shipman, a GP estimated to have been responsible for the deaths of at least 250 of his elderly patients, and the retention of body parts at Alder Hey hospital, public confidence and faith in medical science remain strong – perhaps because in many spheres it is seen as the 'only hope'. This

trend may be linked to the increasing secularization (i.e. decline in the influence of religion) in many sectors of society.

### Increasing risk of iatrogenic diseases

With the growth of medicine, there are more examples of diseases in society that are caused by medical interventions themselves (so-called iatrogenic diseases). Antibiotic-resistant bacteria, for example, are the result of overuse and misuse of antibiotics in the treatment of infections.

**Medicalization can be explained in the following ways**

- Increasing medical knowledge
- Redefinition of social problems as medical problems
- Developments in medical technology (e.g. disease prevention, treatments and investigative procedures).
- Advent of new diseases and medical research attempting to combat them
- Public pressure.

### Increasing medical knowledge

The ability of doctors to intervene in areas that were once beyond their competence – e.g. psychotropic drugs for mental illness, plastic surgery, sterilization, sleeping pills, appetite suppressants, anti-impotence drugs, sex-change procedures, abortions, ‘triple therapy’ for *Helicobacter pylori* infection (associated with duodenal ulcers, previously a largely chronic condition), ‘new genetics’ and genetic counselling.

**Redefinition of social problems as medical problems – some examples**

A drunkard	An alcoholic
Shell shock	Post-traumatic stress disorder
Child sex offender	Paedophile
Naughty child	Child with ADHD
Overweight	Obese
Unhappy	Depressed
Sleeplessness	Insomnia
‘Time of life’	Menopause

### Developments in medical technology

There are new preventive areas in which health professionals intervene – e.g. vaccinations and immunisations (for polio, MMR, whooping cough); vitamin pills and supplements; antenatal and postnatal classes; postnatal visits and check-ups by health visitors.

Increasing technological sophistication, combined with the ‘technological imperative’ (i.e. to intervene if you have the technology to do so), increases the likelihood of medical intervention. Examples include amniocentesis, CAT scans, blood tests, x-rays and surgical procedures such as transplants. Some of this new technology has amazing effects on individual longevity and quality of life (although is problematized in the public mind by the possibility of iatrogenesis – see above). With these evermore sophisticated techniques, people’s reliance on medical ‘experts’ increases. This trend is likely to increase with the growth of ‘new genetics’.

**Advent of ‘new’ diseases and medical research to overcome them in the past 20 years – examples**

- HIV/AIDS
- BSE (bovine spongiform encephalopathy or ‘mad cow’ disease)
- SARS (severe acute respiratory syndrome)
- Ebola virus
- RSI (repetitive strain injury)
- Chronic fatigue syndrome (myalgic encephalomyelitis, ME)

### Pressure from public

While the media may have a role to play in increasing the concern, the high-profile coverage of health issues on TV and in magazines and newspapers is a reflection of greater interest in, and expectations regarding, health among the general public. People are taking more responsibility for their health (or are expected to do so according to various health promotion messages). For example, more people are doing their own

research prior to visiting a doctor, on the internet and elsewhere, and are demanding more medical investigations and interventions. The increasing complexity and mobility of modern society means that older forms of social support (family or friends and neighbours) are not always readily available, and hence the likelihood of using medical services increases. With increased knowledge about health risks and lack of knowledge about what to do about them, perhaps people have become subtly socialized into believing themselves to be more vulnerable and needful of doctors than they were in the past.

## Demedicalization

More recently there has been a movement against medicalization. This has generally been driven by patients voicing their rights as consumers, but it has also been supported by many members of the health professions.

### Examples of demedicalization

- Home births and low-intervention hospital births
- Over-the-counter medicines
- Growth in complementary therapies
- Non-compliance with treatment

## Home births and low-intervention hospital births

While in the 1980s the figure for home births stood at 1% in the UK, by the end of the 1990s this had increased to 2.2%. This trend reflects something of a backlash against the medicalization of pregnancy. Pregnancy, it is argued, is a natural, personal experience, not the unnatural, technical procedure it has become in hospital settings. Hospitals have responded by providing more low-technology 'birthing suites', which offer mothers and their carers an environment more like a comfortable home than a hospital. Much of the pressure for these changes has come from midwives based either in the community or hospital setting.

## Over-the-counter medicines

The increasing number of pharmaceuticals available over the counter (OTC) at pharmacies, supermarkets and other shops is also an indication of demedicalization. Drugs that were once only available with a GP prescription (e.g. Canesten cream for vaginal thrush; emergency contraception – the 'morning-after' pill) can now be bought in a pharmacy.

## Growth in complementary therapies

The current interest in complementary therapies in the UK reflects people's increased interest in health in general, but also their desire to find solutions that are more 'natural', less invasive and more holistic than the perceived offerings of the medical profession.

## Non-compliance with treatment

There is evidence that despite the increasing levels of medicalization and surveillance, there is a great deal of non-compliance in participation and treatment. In other words, medicalization is not necessarily as widespread or as successful as might at first be thought. However, it remains a pervasive influence in society and one that must be taken into account in understanding people's perceptions of medicine in general (e.g. magical, mechanistic, risky) and doctors in particular, and in order to practise forms of medicine that are sensitive to these perceptions – in other words, to be a good doctor.

## The socialization of medicine

While medicine has a growing influence in society, it also reflects and responds to the influences of the society in which it operates.

### Examples of the socialization of medicine

- Roles and accountability within the NHS
- The clinical consultation
- The inverse care law
- Social medicine and community medicine



## Roles and accountability within the NHS

In Chapter 4 we shall see how the roles of men and women are reproduced in the distribution of jobs in the NHS. The trend towards accountability in medicine reflects a more general shift in the way in which professionals are viewed and treated by society – the rise of ‘audit culture’ and what might be thought of as the greater surveillance of medicine by society.

## The clinical consultation

Medicine is also, inevitably, socialized by the clinical encounter. A patient-centred approach requires that doctors take the social and cultural backgrounds of their patients into account when working with them and their problems. The social basis of medicine as reflected in the consultation is covered in Chapter 6.

## The inverse care law

Another way in which medicine reflects society is in the distribution of health care services within and between communities. Julian Tudor Hart, a GP working in South Wales in 1971, coined the term ‘inverse care law’ to describe how health care is unevenly distributed, with those most in need receiving the least. Since then a major public health concern has been the recognition and rectification of such inequality. This forms the subject matter of Chapter 7.

## Social medicine and community medicine

The importance of the social context of medicine is recognized by the development of what has become known as ‘social medicine’ and ‘community medicine’. Some specialities, such as palliative care, are particularly involved in practising forms of social medicine. Another indicator of the broader interests of modern medicine is the growth in the medical humanities movement, with its interest in the representation of medicine in the arts and

humanities, and the application of these disciplines (such as literature, philosophy and the arts) in medicine. To an increasing extent, all branches of medicine are forms of ‘social medicine’.

## Summary

- The biopsychosocial approach is the ‘gold standard’ of modern medical practice and requires an understanding of the biological, psychological and social aspects of health and illness.
- Biopsychosocial medicine is the foundation of ‘patient-centred’ care, and of the ‘whole-person’ approach to the clinical consultation.
- It is important for doctors to understand the social basis of their own work and professional culture as part of a much larger and more complex health system.
- The health system is made up of three sectors – lay, folk and professional.
- Medicine as a profession plays an important and growing role in the life of the public (the ‘medicalization of society’).
- There are moves to reduce the pervasiveness of medicine (‘demedicalization’).
- Medicine is subject to the influence of the society of which it is a part (the ‘socialization of medicine’).
- Health and health care are not equally distributed within society, and social and psychological factors contribute to the inequalities in health that doctors must deal with on a daily basis.
- To an increasing extent, all branches of medicine are forms of social medicine.

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