As most of us in South Africa are only too well aware, we are experiencing severe, intractable problems in providing effective and affordable healthcare for all our citizens. The costs incurred in diagnosis, drug and other therapies, finance and administration are escalating strongly, in common with most countries. Unfortunately, this is happening at a time when more and more demands are being made on our exchequer for the management of the HIV/AIDS epidemic, and its unwelcome attendants tuberculosis, pneumonia and a number of devastating infections. On top of this, we can expect a substantial rise in chronic lifestyle-related conditions such as hypertension, type 2 diabetes and lipid disorders. It gets worse: global warming is expected to bring its own bumper crop of ailments, particularly malaria.

Is orthodox medicine in South Africa capable of dealing satisfactorily with this situation? If the consensus is that it is not, and that alternative sources for providing healthcare for the population as a whole should be examined, then a number of options emerge.

One option is to encourage and support the broader use of African Traditional medicine. The impact of this system can be substantially improved by encouraging better application of training, diagnostic and therapeutic procedures, in the context of benign regulation.

Another option, the subject of this article, is to consider formally introducing integrative medicine. This system, in a word, combines the most suitable elements of orthodox medical system and complementary medicine as equal partners in the provision of healthcare to our population. In theory, perhaps a commendable idea; in practice, does it have a meaningful future in our South African healthcare scenario?

This is not an academic discussion on the relative merits of different healing paradigms, because worldwide there is a substantial swing away from orthodox to complementary medicine. For example, the use of complementary medicine is at an all-time high in the USA, Australia and the UK, with more than 42% resorting to non-orthodox healing practices.

Meaning of integrative medicine
Integrative (or integrated) medicine is the ‘deliberate practice of medicine that selectively incorporates concepts, values and practices of complementary, alternative and orthodox medicine into comprehensive diagnosis and treatment plans.’ It is not just an amalgam of orthodox medicine and complementary / alternative medicine (CAM). Rather, it emphasises wellness and healing of the entire person as the primary outcomes, rather than disease and therapy. It regards the patient in his or her entirety, not only as a physical body, but with mental and spiritual dimensions as well. All of these are recognised, and involved in diagnosis and treatment whenever appropriate. Furthermore, integrative medicine is concerned with encouraging individual responsibility for one’s own health, and tries to avoid the more authoritarian approach generally adopted in orthodox medicine. Finally, it accepts that the sources of good medical practice can arise from either orthodox medicine or CAM, or from both in combination. In short, integrative medicine is a partnership of equals, with the patient and the practitioner involved in the development and implementation of a comprehensive treatment plan, not just the patient’s immediate ailment.

Confusion can arise regarding the term ‘holistic health’. How does integrative medicine square with ‘holistic health’, a term which is used extensively here in South Africa and elsewhere? Holistic health is, according to
the American Holistic Medical Association, ‘the state of well-being in which an individual’s body, mind, emotions and spirit are in tune with the natural, cosmic and social environment’. Holistic medicine therefore takes into account the physical, mental, spiritual and social factors in the patient’s illness, rather than just the disease which has been diagnosed. In other words, it has as its basic tenet the optimum health of the individual, not simply the absence of illness. Holism, therefore, is a central axiom of integrative medicine.

One feature of integrative medicine is that it considers the origins of disease to be multifactorial in nature, possibly embracing genetic, physical, emotional, psychological, and spiritual elements. An integrative medicine approach therefore seeks to identify multiple origins of a disease, and, ideally, address them all as necessary. As a result, the range of options in the practice of integrative medicine can go beyond standard orthodox therapeutic practice. It can transcend the patient’s spiritual life and social relationships, employ mind-body practices, and combine this with the use of herbs, physical manipulation techniques and surgery.

Definitions:

Alternative: a term generally used to denote any therapies which are used instead of orthodox medicine. Usually includes African traditional medicine.

Complementary: therapies used alongside orthodox medicine

CAM: the abbreviation for complementary and alternative medicine.

Integrative: the deliberate combination of complementary and orthodox therapy in a systematic and thoughtful manner aimed at uncovering and rectifying the patient’s clinical problem.

Holistic: the state of well-being in which the person’s body, mind, emotions and spirit are in tune with the physical, mental, spiritual and social environment. Holistic therapy in this study refers to treatment in which the physical, mental and social factors are taken into account, rather than just the overt diagnosed disease.

Orthodox medicine: the standard scientific/medical model for Western and developed countries; also termed allopathic or conventional medicine.

Problems with orthodox medicine usage in South Africa

Why do we have to even consider a new medical paradigm in South Africa? After all, many people, especially those of European origin, feel most comfortable with orthodox medicine. It has a proven success rate in dealing with many healing problems, acting quickly to suppress troublesome symptoms. In fact, effective treatment of certain conditions is accepted as the norm now, whereas in the not-to-distant past a successful outcome for the same condition would be regarded as miraculous.

There is, however, a catalogue of drawbacks to the practice of orthodox medicine in this country, which have been responsible to a greater or lesser extent for the noticeable swing to CAM, and which would support the case for integrative medicine.

The high cost of orthodox medicine. Unfortunately, orthodox medical care is increasingly expensive, and so largely inaccessible for the majority of South Africans. The medical research and development machine is churning out more and more diagnostic techniques, surgical procedures and drugs, all of which come with an impressive price-tag. Alas, it is becoming evident that increased healthcare expenditure in technology, services and new drugs does not necessarily translate into better health for the community, or even longer life expectancy. Extra money does not go towards the provision of effective healthcare; instead the money goes to more diagnostic tests, more referrals to specialists, and more hospital visits.

Adverse drug reactions and iatrogenic disorders. In recent years, disenchantment with adverse drug reactions, whether leading to troublesome subjective side effects or to more insidious metabolic changes, has spurred renewed interest in CAM. Side effects and idiosyncratic reactions are inextricably linked to orthodox medicine. Not only are these adverse drug reactions troublesome to the patient, and lead to poor or even non-compliance, but they may also encourage further (costly) medication in order to oppose the side effects experienced by the patient. This is evident in the vicious cycle of drug use leading to intolerable side effects, leading to additional drug use, leading to other side effects, and so on. In this context, the use of, say, herbal medicine, in the treatment of a chronic condition is particularly appealing if it accepted as both effective and relatively free from side effects.

This atmosphere of dissatisfaction has been reinforced by the adverse publicity attached to the withdrawal of a number of front-line drugs recently. People are not over-impressed by this, and confidence in the assumed safe
use of drug is seriously undermined. This creates the climate which encourages the search for reasonable alternatives that may be less effective, but more comfortable to live with.

The doctor-patient relationship. This is acknowledged as being far from ideal in South Africa. All too often it is badly affected by poor verbal and written communication, little genuine empathy or understanding of each other, an increasingly unacceptable authoritarian approach by the doctor, and depersonalisation to a degree which can be demeaning to the patient. Also, patients are becoming exposed increasingly to accurate (usually) information on diseases and their management, and would like to be more involved in not only dealing with the disorder. Finally, they are becoming increasingly aware from the media and Internet of the importance of preventing recurrence of their illness by lifestyle/behaviour modification. This information is rarely offered enthusiastically by the doctor.

Worldwide swing to complementary and alternative medicine (CAM)

Worldwide there is undeniably, and not unexpectedly, a substantial swing away from orthodox medical to CAM systems. In part this reflects an increase in interest in alternatives which is consistent with present day consumerist philosophy, and which is socially acceptable (and even desirable). Moreover, there is evidence accumulating of the undoubted effectiveness of alternatives to orthodox medicine which are becoming more generally available, and ‘getting a better press’.

Facts speak for themselves. CAM’s use is at an all-time high in the USA, Australia and the UK, with more than 42% resorting to non-orthodox healing practices. The number of consultations for and spending on CAM healthcare is rising impressively in the USA, from 425 million in 1991 to 629 million in 1997, far exceeding the number of visits (approx. 390 million) to orthodox practitioners over the same period.

Perhaps more relevant, however, is that a majority of people (55%) combine CAM measures with orthodox medicine, for a broad range of conditions; musculo-skeletal problems, anxiety and depression, insomnia, colds, and stomach disorders. Also treated are hypertension, hypercholesterolaemia, menopausal symptoms, asthma, diabetes and, sometimes, cancer.

Although many CAM therapies, such as Ayurveda, herbalism, Chinese medicine and Tibb, have been established and evolved over millennia, and relative newcomers like homeopathy, naturopathy and aromatherapy have been around for decades, their widespread use in Westernised, industrial countries has only been recognised quite recently.

What are the reasons for this shift to CAM? Several factors have been identified which drive this trend. Cost of orthodox medical care was mentioned earlier; however, it should be noted that substantial ‘out-of-pocket’ expenses can be incurred by the patient in the quest for healing by CAM. Another is dissatisfaction of the treatment outcome. A good, and relevant, example is the increasing resistance reported with antibiotics used to treat common, everyday infections. A further reason, interestingly, is that the impersonal nature of present-day hi-tech medicine may divert people to CAM, especially if they seek more holistic involvement in their own healthcare. Research in this field has revealed that the philosophical orientation towards the whole person, rather than a specific defect of a particular tissue or organ, is a powerful attractant to CAM.

Another factor is the substantial disaffection often expressed by patients and practitioners alike with how orthodox care is provided, relying heavily as it does on pharmaceutical medicine for the suppression of symptoms, to the detriment of dealing with the underlying causes.

Also, a reason (which probably applies less to South Africa, given our present demographic make-up), is that as the population ages and chronic conditions become predominant, the use of CAM takes off. Orthodox medicine is perceived, rightly or wrongly, as poorly tolerated or less effective, especially to those already in a cost-conscious frame of mind.

A more tenuous reason, perhaps, is the rise of individualism, especially in industrialised countries, which brings with it a demand for greater control and empowerment over life’s events. This often goes hand-in-hand with the rejection of traditional medical authority, coupled with a general decline of faith in the ability of orthodox medicine to solve health problems satisfactorily.

Relationship between orthodox and complementary practitioners

If the practice of integrative medicine is between partners, how do they get on together? Not long ago, orthodox and complementary healthcare practitioners were visibly intolerant of the other, and summarily dismissed each other’s therapies as either ineffective or dangerous. Many CAM systems diverge markedly from orthodox medicine in their philosophy, diagnosis and treatment, and as a result remained largely marginalised. In addition, until quite recently, most CAM systems offered few if any scientific methods with which to study
them which were acceptable to orthodox practitioners. Furthermore, there were no obvious ways in which to incorporate them into orthodox practice, even if certain aspects of CAM care were found to be useful. However, these perceptions are clearly changing. Today, many complementary practitioners are willing, albeit grudgingly, to admit that in the management of acute disorders and emergencies, orthodox medical practice is supreme. In the meantime, orthodox doctors concede that it usually takes more than just drugs or surgery to cope with persistent disease or stress-related ailments, and accept that diet changes, stress management, detoxication and physical exercise can be valuable adjuncts to total medical care. Indeed, many orthodox practitioners are now embracing one or more holistic therapies; the idea of this alternative approach to health is becoming popular once more. Furthermore, a number of doctors, especially in the USA, are now training in CAM systems. More and more orthodox practitioners are learning about, and applying in their practice disciplines such as acupuncture, herbalism and homeopathy which were previously the exclusive domain of CAM practitioners. Moreover, in a number of aspects of orthodox care, the basics of integrative medicine are being applied in areas such as diabetes management, geriatric care, and the management of chronic pain.

As the dichotomy between orthodox and complementary practice becomes blurred, and more doctors accept the value of non-orthodox healing systems, then patients should be able to enjoy the best of both worlds. This is recognised by certain hospitals, medical insurers, and groups of healthcare providers, who are now explicitly accepting, and in some cases incorporating, CAM practitioners and therapies. One area in which orthodox medicine and CAM do differ, however, is in the diagnosis of disease. A common feature of CAM systems is their emphasis on looking for patterns of dysfunction that manifest throughout the individual, rather than isolated problems in separate bodily sub-systems. Moreover, CAM applies its own theory-driven method for categorising patients. In asthmatic patients, for instance, the main CAM systems are likely to identify several different sub-types, each of which requires a therapeutic intervention which is unique to the patient affected. Also, patterns of symptoms are of paramount interest in some CAM paradigms. In contrast, orthodox medicine’s approach to diagnosis is the general way of labeling the patient, and considers that the symptoms and signs describe the disease, and that these are the primary targets for medical intervention. Although it may respect the patient’s emotional state and spiritual values, these have virtually no place in diagnosis and therapy along orthodox lines. As a result, differences in the approach to diagnosis between orthodox and CAM paradigms can lead to divergent therapeutic interventions, and even to different healing objectives.

Another sphere in which orthodox medicine and CAM systems differ is in their attitude to research in verifying clinical efficacy. The gold standard of research favoured by orthodox medicine is the randomised clinical trial, in which homogeneous groups made up of pre-determined numbers of patients with confirmed diagnoses of specific disorders are compared after treatment with one or other treatment modalities or placebo, and the specified outcomes compared by rigorous statistical analysis. The application of orthodox methodology to CAM systems is fraught with problems. Even in orthodox research, studies on the cost-effectiveness of preventative interventions, for example, are highly expensive, very time consuming and notoriously difficult to plan, conduct, analyse and report. It is a sad fact of medical life that ‘Big Pharma’ has a virtual monopoly on clinical research, and very few CAM organisations worldwide have the funds or capacity to carry out research outside the orthodox paradigm, which is largely orientated towards biochemical changes and drug effects.

Even so, when researchers study treatment methods which are similar to the pharmacological orientation of orthodox medical care, such as herbal products or nutrients, they tend to focus on a specific action of a specific constituent on an isolated sub-system of the body. Little emphasis is placed on the entire spectrum of actions the agent can exert on multiple, interdependent sub-systems of the individual as a whole. Alternatively, orthodox-orientated researchers tend to ‘cherry-pick’ interesting parts of CAM technique; herbalism and acupuncture are good examples, without taking into account the full context of the CAM system: diet, herbal products, energy systems, and environmental interventions, all of which contribute to the healing of a unique, systemic disorder in particular patient. Orthodox research methods can be applied to the effect of CAM therapy on specific target organ systems, but it will most likely miss the full response which affects the total body system.

The range of complementary medical systems
The terms ‘complementary’, ‘alternative’ and ‘integrative’ medicine refer to an extraordinarily diverse set of therapeutic paradigms, most of which have little in common with each other. CAM itself differs from orthodox medicine in that it believes healing originates within the patient, rather than from the doctor, a concept that is
compatible with the World Health Organisation’s definition of health, which equates health with well-being:
‘health is a state of complete physical, mental and social well-being and not merely the absence of disease or
infirmity’
Complementary medicine embraces a wide range of philosophies and treatments. The challenge, therefore, is
to select one which provides a comfortable fit with the orthodox paradigm in forming integrative medicine.
Preference should be given to a system which is philosophically congruent, not at variance, with the basic
axioms of orthodox medicine, which has provided unequivocal evidence of therapeutic benefit, and which has
defined standards and competencies. One possible candidate is Tibb.
There are numerous CAM modalities, too numerous to elaborate on in this article. They can be allocated
arbitrarily to three basic groups:

**Group 1**: a number of organised and regulated systems of therapy: Ayurveda, Tibb, homeopathy, acupuncture,
herbal medicine, naturopathy, and others. These have an established research base.

**Group 2**: a number of less organised or regulated systems: aromatherapy, hypnotherapy. These are frequently
used as part of Group 1 therapies, or to complement orthodox medicine. Members of this group would benefit
from the establishment of a research base.

**Group 3**: includes traditional therapies which have been well established in several cultures for centuries or
even millennia, plus others (crystal therapy and dowsing) for which there is virtually no acceptable research
evidence.

There are a number of differences between orthodox medicine and the various CAM modalities, which can be
summarised:

<table>
<thead>
<tr>
<th>Orthodox medicine</th>
<th>Complementary medicine</th>
</tr>
</thead>
<tbody>
<tr>
<td>Based on deductive reasoning</td>
<td>Based on empirical, inductive observation</td>
</tr>
<tr>
<td>More reductionist in approach</td>
<td>More holistic in approach</td>
</tr>
<tr>
<td>More authoritarian and controlling</td>
<td>More empowering and flexible</td>
</tr>
<tr>
<td>Adopts a generalized approach</td>
<td>Based on the uniqueness of the individual</td>
</tr>
<tr>
<td>An objective and scientific philosophy</td>
<td>More intuitive or subjective in philosophy</td>
</tr>
<tr>
<td>More concerned with the disorder</td>
<td>Seeks to understand the patient</td>
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</tbody>
</table>

**An overview of Tibb**

Tibb (also known as Unani-Tibb, or the Unani system of medicine) is an established system of healthcare
based on the original precepts of Hippocrates, Galen and Ibn Sina (perhaps more familiar as Avicenna). The
person’s inner force for healing is encouraged and reinforced by a combination of botanicals, physical
interventions and governing factors, which include the individualised application of dietary and lifestyle
changes, such as stress relief, detox processes, sleep hygiene, breathing exercises and exercise regimes.
Empowerment of the patient is an essential component of Tibb, as it affirms that the healing process is
originated from within the patient, not by the doctor.
The main principles of Tibb are as follows:
Tibb emphasises achieving good health, rather suppressing the disease. It directs therapy at the underlying
causes, rather than concentrating mainly on symptoms.
Diagnosis is carried out bearing in mind the patient’s temperament, which can be described as an amalgam of
personality and constitution. Great importance is attached to subjective information, although standard
orthodox tests are utilised.
Tibb therapy focuses on diet, lifestyle modification and preventative measures, supplemented by natural
products. Various forms of ‘hands on’ therapy are employed.
The practitioner’s care and empathy are critical to healing, and he/she becomes a partner in the Tibb healing
process.
Tibb treats the whole patient as a unique individual, rather than a particular target organ or tissue. The patient’s
temperament is fundamentally important in both diagnosis and therapy. Tibb regards the body and mind as
being strongly interconnected.
Empowerment of the patient is an important aspect of Tibb. The patient has a say in health care choices,
guided by his or her practitioner.
Tibb is fully compatible with the principles and practice of integrative medicine.
Diagnosis of a particular disorder in Tibb is of paramount importance, and considerable time and effort is
expended in achieving this. Whereas in times gone by much significance was attached to urinalysis and pulse
diagnosis, these techniques, although still used to some extent, have been largely superceded by those employed by modern orthodox medicine. As part of diagnosis, Tibb practitioners attach great importance to the patient’s and the family’s medical history, his or her temperament, and carry out standard physical examinations.

In practical terms, Tibb resorts extensively to the use of herbal products. Perhaps surprising to some, around 25% of drugs used even today are derived, directly or indirectly, from plants. Hundreds of studies have been performed which testify to the benefit of herbal products in the treatment of a wide spectrum of common disorders, from anxiety to constipation, insomnia to lethargy, and irritable bowel syndrome to a weakened immune system.

**Tibb is a good partner for orthodox bio-medicine**

Whereas orthodox medicine is indisputably pre-eminent in acute conditions, Tibb’s therapeutic potential lies in its capacity to deal effectively with chronic, long-term conditions. Although practitioners of orthodox bio-medicine are becoming increasingly aware of the multifactorial nature of a number of chronic conditions, and the role that behavioural factors and personal habits play in their onset and progress, addressing the causes of chronic conditions has always been a central tenet of Tibb. For example, a recent study confirmed the benefit of lifestyle adjustment, specifically diet and exercise, to the marked improvement of patients exhibiting unequivocal signs and symptoms of the metabolic syndrome. Hypertension, dyslipidaemia, obesity and glucose intolerance were significantly reduced by lifestyle changes carried out by the subjects.

Tibb is consistent with orthodox bio-medicine, in that they both share a common origin in the form of Hippocrates and other historical pioneers. In fact, Tibb restores to medicine the precepts and practice of Hippocrates that have been removed in the last 300 years or so, beginning with Descartes, and ending with the doctrine of specific aetiology. Another factor in favour is the similarity of Tibb to orthodox medicine, in that it is more ‘metabolic’ orientated, rather than ‘energy’ orientated, as is the case with some of the traditional Eastern systems of medicine.

**Obstacles to introducing integrative medicine**

Realistically, it must be acknowledged that there are a substantial number of obstacles on the road to the introduction of integrative medicine in South Africa, placed in the way from both orthodox and CAM practitioners. There are differences in medical philosophy, professional style, costs of consultation diagnosis and therapy, past training processes and organisational structures.

From the orthodox perspective, these are:

- A strong conviction of the innate superiority of orthodox medicine.
- A lack of belief or reservations in the therapeutic effect of CAM.
- Ignorance and distrust of CAM principles and therapies.
- Fear of competition for patients, especially for those with chronic disorders.
- Lack of access to training and practice of CAM.
- Cost effectiveness of CAM, as medical aid schemes usually non-supportive.
- Fear of legal liability if CAM therapy fails.
- Strongly ingrained habits and tradition.

On the other side of the coin, there are a number of reservations from practitioners of CAM about a partnership with orthodox medicine:

- Lack of hard, validated evidence of clinical effectiveness of integrative medicine.
- Lack of legal recognition of integrative medicine.
- Lack of appropriate training needed to apply integrative medicine.
- Philosophical differences on therapeutic routes and outcome.
- Lack of communication within the different medical paradigms.
- Historical prejudice against, and fear of, orthodox medicine.

**Developments in applying integrative medicine in South Africa**

In a medical journal as exalted as the British Medical Journal, the editor not too long ago encouraged his readers to be more open minded on how complementary medicine might be researched and incorporated into medical training. More, and better, clinical evidence is needed if CAM therapies are to be accepted by mainstream medicine. State of the art research methods developed by conventional science will be needed to test CAM therapies. Acceptance by orthodox doctors of the practice of integrative medicine would undoubtedly be accelerated if firm evidence of the efficacy and safety of specific complementary therapies was forthcoming.
Tibb accepts this, and as part of its training and education programme it has initiated research-focused activities aimed at validating Tibb philosophical principles, as well as to quantify the effectiveness of its treatment. In the postgraduate Diploma programme (Dip UTM) at the University of the Western Cape (UWC) open pilot studies have been conducted in the effectiveness of Tibb in the management of chronic illnesses such as diabetes, hypertension, HIV/AIDS and arthritis. These pilot research projects have yielded positive and encouraging results which need to be expanded upon in future studies. Research has also been conducted recently at the Nelson Mandela School of Medicine, the University of Natal on the relationship between temperament and chronic conditions such as diabetes, hypertension and bronchial asthma.

Conclusion

The trend to integrative medicine is not a passing fashion; it offers South Africa the best of both worlds, as an equal partnership of orthodox and complementary medicine. Some regard it as the medicine for the new millennium. The involvement of Tibb is a logical one, as it is broadly consistent with orthodox medical practice, and its proven clinical benefits are based on evidence. Integrative medicine is an all-embracing primary healthcare system that emphasises wellbeing and healing of the whole person, by considering the biological, psychological, social, and spiritual dimensions of health and disease as major goals of therapy, above and beyond suppression of a specific somatic disease.

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