the financial cost of healthcare fraud
what data from around the world shows

Jim Gee, Dr. Mark Button and Graham Brooks

Foreword by Dr. David Evans, Director of Health Systems Financing, World Health Organisation
Preface by Paul Vincke, President of the European Healthcare Fraud and Corruption Network

2011 REPORT
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The World Health Report of 2010 on Health Systems Financing: the Path to Universal Coverage (World Health Organisation, 2010) made the point that health financing was not simply about raising sufficient money for health. That is clearly important and a fundamental objective of health financing systems, but it is equally important to ensure that financial barriers do not deter people from seeking or continuing to use the health services they need, and that the resources that are available are used efficiently and effectively. Universal coverage requires all people to have access to quality health services (prevention, promotion, treatment and rehabilitation) when they need them without the risk of incurring severe financial problems linked to paying for care.

In the chapter dealing with getting better value for money, we sought to identify the main causes of inefficiency and the costs they imposed on a health system. We identified 10 major causes of inefficiency, one of which was fraud, and our estimates suggested that combined, they might result in the waste of up to 30-40% of all health resources. Put another way, societies could get between 30% and 40% more health for the money they spend by eliminating inefficiencies.

The available information on the extent and nature of these inefficiencies across the 193 Member States of the World Health Organisation was, however, sparse, particularly for fraud which has traditionally been considered to be very difficult to quantify. This Report, and the work behind it, begins to shed light on this important issue. It reveals the latest estimates of the financial losses that accrue to countries because of fraud in health systems. These estimates are based on a standard methodology which leads to greater confidence in the results. It also outlines the nature of the most common frauds, giving indications of the areas in which preventive and curative measures could be taken to reduce the losses and showing how steps can be taken to make rapid gains.

It makes sobering reading. The losses are very substantial and fraud occurs in rich and poor countries. Nowhere were the losses less than 3% of overall health expenditures and they were as high as 15% with an average of over 7% across the countries included in the study. By bringing this issue into such stark focus, it is hoped that this provides an incentive for countries to seek to identify and eliminate the problem. Lives are at stake. Every dollar saved from fraud could be used to ensure that people have access to more or better health services thereby saving lives.

Dr. David Evans

Director of Health Systems Financing,
World Health Organisation

Reference
Over the last five years, experts in health systems financing from all over the world have continuously repeated – as a mantra to avert budgetary calamity – how important it is to stop healthcare expenses from absorbing an ever increasing percentage of GDPs. According to the experts, many countries already face great difficulties sustaining the financial viability of their health systems, leading to (literally) painful cost-cutting strategies, as patients no longer receive the healthcare provision they are entitled to.

The additional consequences of the 2008 and 2011 financial crises have made the problem worse, especially for patients in Greece, Portugal, Italy and Ireland.

The European Healthcare Fraud and Corruption Network from its side, has not stopped insisting, since its establishment in 2006, that deciding to fight fraud in healthcare is the first and most effective step for governments and for private insurers when setting up cost cutting strategies in order to stop losses without reducing the access to and the quality of care.

EHFCN member organizations in the Netherlands, Belgium, the UK, Norway and France have shown evidence of their effectiveness by recovering millions of defrauded Euros to the benefit of their national health systems. Too often however these counter fraud activities focus on detection only, chasing the smoke and not going for the fire. As a consequence, only part of the problem is being addressed, leaving other potential areas of risk blank and wide open for more fraudulent behavior.

Proactive measurement of healthcare fraud losses allows for better prioritizing of counter fraud actions and more efficient investment of means. Intelligent use of business analytics additionally allows for stopping perpetrators before the fraud has its full devastating effect.

Healthcare however is a difficult terrain for fraud fighters. Reasons are that there is little transparency and there are powerful lobbies of stakeholders. Exposing the phenomenon of healthcare fraud is one of the last taboos in society. Healthcare professionals are organized in powerful lobbies with a high corporatist reflex when confronted with evidence of abuse and fraud committed by peers. Patients do not understand the substantial impact of this fraud on the affordability of healthcare.

That is why, apart from a minority of EU countries where there is a professional approach to countering healthcare fraud, in others there is no sense of urgency amongst stakeholders (especially the government) to organize the fight against healthcare fraud. There should be!

As this updated report on the financial cost of healthcare fraud is based on healthcare loss analysis exercises from within countries where an active counter fraud strategy is being implemented, it is to be expected that the average percentage of losses will be even higher in countries where no counter fraud strategy exists at all, considering its preventive and dissuasive effect.

The European Healthcare Fraud and Corruption Network considers this report to be a valuable and accurate indicator for the financial cost of healthcare fraud in the referred to countries. It is also an invitation for all those where tackling healthcare fraud is not high enough on the agenda. It is EHFCN’s objective to have these agendas adjusted accordingly.

Paul Vincke
President of the European Healthcare Fraud and Corruption Network
introduction
1 // introduction

1.1 In January 2010, for the first time, an in-depth ‘Financial Cost of Healthcare Fraud’ Report was published. The research on which it was based collated the latest, accurate, statistically valid information from around the world about the real financial cost of fraud and error in healthcare.

1.2 This Report renews and updates that research, considering losses across a dataset which covers three times the value of healthcare expenditure previously examined - over £1 trillion sterling equivalent.

1.3 The measurement of losses to fraud (and error) is an essential first step to successful action. Once the extent of fraud losses is known then they can be treated like any other business cost – something to be reduced and minimised in the best interest of the financial health and stability of the organisation concerned. It becomes possible to go beyond reacting to unforeseen individual instances of fraud and to include plans to pre-empt and minimise fraud losses in business plans.

1.4 The Report doesn’t just look at detected fraud or the individual cases which have come to light and been prosecuted. Because there is no crime which has a 100% detection rate, adding together detected fraud significantly underestimates the problem. It is also the case that if detected fraud losses go up, does that mean that there is more fraud or that there has been better detection; equally, if detected fraud losses fall, does that mean that there is less fraud or worse detection?

1.5 The Report also doesn’t rely on survey-based information where those involved are asked for their opinions about the level of fraud. These tend to vary significantly according to the perceived seriousness of the problem at the time by those surveyed. While they sometimes represent a valid survey of opinion, that is very different from a valid survey of losses.

1.6 The financial and economic damage resulting from healthcare fraud (and error) is surely the worst aspect of the problem. Yes, fraud is unethical, immoral and unlawful; yes, the individuals who are proven to have been involved should be punished; yes, the sums lost to fraud need to be traced and recovered. However, these are actions which take place after the fraud losses have happened – after the resources have been diverted from where they were intended and after the damage to the quality of patient care has occurred.

1.7 In almost every other area, healthcare organisations know what their costs are – staffing costs, accommodation costs, utility costs, procurement costs and many others. For centuries, these costs have been assessed and reviewed and measures have been developed to pre-empt them and improve efficiency. This incremental process now often delivers quite small additional improvements.

1.8 Fraud and error costs, on the other hand, have only very rarely had the same focus. The common position has been that organisations have either denied that they had any fraud or planned only to react after fraud has taken place. Because of this, fraud is now one of the great unreduced healthcare costs.

1.9 However, a cost can only be reduced if it can be measured, and a methodology to do this accurately has only been developed and implemented over the last decade.

1.10 Now that we can measure fraud and error losses, we can make proper judgements about the level of investment to be made in reducing them. Now that we can measure these losses, we can measure the financial benefits resulting from their reduction.

1.11 In the current macro-economic climate, reducing these losses is one of the least painful ways of reducing costs. This Report identifies what the financial cost of healthcare fraud and error has been found to be and, thus, the ‘size of the prize’ to be achieved from reducing them.

1.12 Of course, there is always more research to be done and any organisation should consider what its own fraud and error costs are likely to be. However, the volume of data which is already available from exercises now covering over £1 trillion, points clearly to losses usually being found in the range of 3-8%.

1.13 We will continue to monitor data as it becomes available and publish further Reports as appropriate.

Jim Gee
Director of Counter Fraud Services, PKF (UK) LLP
and
Chair of the Centre for Counter Fraud Services, University of Portsmouth
overview – the nature of the data that has been analysed
2.1 This Report has reviewed 79 exercises to accurately measure healthcare fraud and error losses, undertaken between 1998 and 2009, in 33 organisations from six countries, covering many different types of healthcare expenditure totalling over £1 trillion in value. The value of the expenditure examined has not been uprated to 2011 values.

2.2 It is important to be clear about the basis for this Report. It is based on extensive global research, building on previously established direct knowledge, to collate information about relevant exercises. The data was then analysed electronically. Exercises were considered from Europe, North America and Australia and New Zealand. None were found in Asia or Africa.

2.3 The Report has excluded guesstimates, figures derived from detected fraud losses, figures resulting from surveys of opinion and figures which have not been independently validated. It has also excluded some loss measurement exercises where it is clear that they have not met the standards described below.

2.4 It has included exercises which

- have considered a statistically valid sample of income or expenditure
- which have sought and examined information indicating the presence of fraud, error or correctness in each case within that sample
- which have been completed and reported
- which have been externally validated
- which have a measurable level of statistical confidence
- which have a measurable level of accuracy

2.5 There are a number of caveats.

- Some exercises have separately identified measured healthcare fraud and error and some have not.
- Sometimes, once such exercises have been completed, the organisations concerned have mistakenly, in the view of the authors of this Report, decided not to publish their results. Transparency about the scale of the problem is a key factor in its solution, because attention can be focused and a proportionate investment made.
- In some cases, those directly involved in countering fraud have decided, confidentially, to provide information about unpublished exercises for wider consideration. In those cases, while the overall figures have been included in the findings of this Report, no specific reference has been made to the organisations concerned.
- The authors of this Report are also aware of a very small number of other exercises which have been completed, but which have not been published and where nothing is known of the findings.
- Finally, it is important to emphasise that this research will never be complete. More evidence becomes available each year. However, the preponderance of the evidence does point clearly in one direction, as is explained later.

2.6 While it is necessary to make these caveats clear, the importance of the evidence collated in this Report should not be underestimated. The evidence shows healthcare fraud and error losses can be measured – they have been successfully measured many times in many different organisations and across the world.

2.7 However, even more important is that the evidence shows that losses to healthcare fraud and error are significant and seriously undermine the quality and extent of patient care which can be provided.
2 // overview – the nature of the data that has been analysed

2.8 The six countries in which the authors are aware that healthcare loss analysis exercises have taken place are:

- the UK;
- the United States;
- France;
- Belgium;
- The Netherlands;
- New Zealand.

2.9 By value of income or expenditure measured, the United States has undertaken the greatest amount of work in this area. This is a direct reflection of the Improper Payments Information Act of 2002 (IPIA), now followed by the more recent Improper Payments Elimination and Recovery Act of 2010, which requires designated major US public authorities to estimate the annual amount of payments made where fraud and error are present, and to report the estimates to the President and Congress with a progress report on actions to reduce them.

2.10 The guidance relating to the IPIA stated “The estimates shall be based on the equivalent of a statistical random sample with a precision requiring a sample of sufficient size to yield an estimate with a 90% confidence interval of plus or minus 2.5%”. Many US agencies undertake work to the higher standard often found in the UK and Europe – 95% statistical confidence and + or - 1%.

2.11 In other countries, while there has not hitherto been any legal requirement, there is a growing understanding that the key to successful loss reduction is to understand the nature and scale of the problem. For example in Europe, the European Healthcare Fraud and Corruption Declaration of 2004, agreed by organisations from 28 countries, called for “The development of a European common standard of risk measurement, with annual statistically valid follow-up exercises to measure progress in reducing losses to fraud and corruption throughout the EU.”

2.12 In other countries, while there has not hitherto been any legal requirement, there is a growing understanding that the key to successful loss reduction is to understand the nature and scale of the problem.

2.13 The range of types of income and expenditure where losses have been measured include fraud (and error) involving patients, healthcare professionals, staff and managers, and contractors.

2.14 The specific areas where losses have been measured include:

- the fraudulent provision of sickness certificates
- prescription fraud by pharmacists
- prescription fraud by patients
- fraud and error concerning capitation payments to general practitioners
- fraud and error concerning payments made to doctors to manage a patients medical care
- the evasion of dental charges by patients
- fraud and error by opticians concerning the provision of sight tests
- fraud and error concerning employees of healthcare organisations
- fraud and error concerning payments for in-patient hospital services
- fraud and error concerning long term care
- fraud and error concerning home and community based services
- fraud and error concerning the provision of services and supplies
- fraud and error concerning health insurance for children
- fraud and error concerning foster care
- fraud and error concerning child care.
the nature of the figures and what the losses are
3 // the nature of the figures and what the losses are

3.1 The Report focuses on what its authors believe to be the most important issue, the percentage of healthcare expenditure lost to fraud and error (or Percentage Loss Rate - PLR), and therefore not spent on the provision of good quality healthcare.

3.2 There is more research still to be done, and it is intended that this Report will be updated on a regular basis.

Healthcare fraud and error losses

3.3 The range of percentage losses (PLR) was found to be between 3.00% and 15.4% with an average PLR of 7.29%.

3.4 100% of the exercises showed PLR figures of more than 3%, with more than 40% recording losses of over 8%.

3.5 On the basis of the evidence, it is clear that healthcare fraud and error losses in any organisation should currently be expected to be at least 3% of expenditure, probably more than 7% and possibly over 10% of expenditure.
3 // the nature of the figures and what the losses are

3.6 This 2011 research also includes data from the two years after the onset of the recession - 2008 and 2009. Exercises across the period between 1998 and 2007, as described in our 2009 Report, show averages losses of 5.59%; however when we include data concerning losses in the years 2008 and 2009, this running average, now over 11 years, increases by over 30% to its current rate of 7.29%.

3.7 This increase parallels a similar increase in losses to fraud (and error) in other sectors, as well as data from previous recessions concerning reported fraud and forgery.

3.8 Separate research, analysing 29 key aspects in relation to how well organisations protect themselves against fraud (the extent of their ‘fraud resilience’), continues. It is common sense that the worse protected against fraud that organisations are, the higher their losses will be.

3.9 However, by calibrating the data which underpins this report and data about fraud resilience, we are now able, for the first time, to predict the likely scale of losses, the key improvements which would reduce them and the related cost, for healthcare organisations.
4 //

conclusion and recommendations
4 // conclusion and recommendations

4.1 This Report renews research into accurate information concerning the extent of losses to healthcare fraud and error. Without such information it is impossible for healthcare organisations to properly prioritise the problem or to invest proportionate sums in solving it.

4.2 The research demonstrates conclusively that it is possible to measure the nature and extent of healthcare losses. It may be embarrassing for some organisations to find out just how much they are losing, but it is possible to do this.

4.3 Because of the direct, negative impact on human life of healthcare losses, it is never easy to admit they take place. However, the first step to reducing losses is to stop being in denial about them. If an organisation is not aware of the extent or nature of its losses, how can it apply the right solution and reduce them?

4.4 Where losses have been measured, and the organisations concerned have accurate information about their nature and extent, there are examples where losses have been substantially reduced. These include the UK’s National Health Service (the second largest organisation in the world), between 1999 and 2006, where losses were reduced by up to 60% and by up to 40% over a shorter period.1

4.5 Three things are clear:
   - Losses to healthcare fraud and error can be measured – and cost effectively;
   - On the basis of the evidence it is likely that losses in any healthcare organisation and any area of expenditure will be at least 3%, probably more than 7% and possibly over 10%;
   - And with the benefit of accurate information about their nature and extent, they can be reduced significantly.

4.6 This Report shows just how much is being lost. The average percentage of expenditure lost, across such a wide range of healthcare expenditure, was 7.29%. The World Health Organisation’s latest estimate of global healthcare expenditure is US $5.7 trillion (€4.13 trillion or £3.54 trillion).

4.7 Thus, it is likely that around US $415 billion, €301 billion or £259 billion is lost globally to fraud (and error). This is the equivalent of more than twice the budget for the entire UK NHS or enough to build more than 2,300 new hospitals (at developed world prices) and more than the entire national GDP of all but 29 of more than 190 countries across the world.

4.8 Countering fraud effectively would reduce these losses and free up massive resources for better patient care. The authors of this Report hope that it focuses attention on this problem and the potential benefits to be derived from starting to solve it.

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Below are some examples from across the world of healthcare fraud:

Fraud by managers and staff

- Payroll fraud: Managers or staff employed by healthcare providing organisations (public or private health insurers, national health funds, etc.) obtaining employment or advancing their careers by claiming false employment histories or qualifications;
- Misdirection of resources: One finance manager was found to have placed their family on the payroll of the healthcare organisation that they worked for;
- Personal impropriety: One Chief Executive Officer of a healthcare organisation was found to have overclaimed on his mileage allowance by 55,000 miles;
- Hospitals: Hospitals have been found to falsely claim that they have undertaken surgical procedures to attract extra payments.

Fraud by healthcare professionals

- Doctors: Two doctors were found to have claimed a Government improvement grant for their surgery and to have subsequently spent the money on creating a car import/export business;
- Doctors: It was reported from Taiwan that three doctors who admitted to conspiring with patients to defraud insurance companies of almost NT$80 million have had their licenses revoked for the first time in Taiwan's medical history. A syndicate of medical personnel had been falsely diagnosing patients with cancer – going as far as performing breast removal surgeries and chemotherapy in disease-free bodies – since 2003 to file multiple insurance claims;
- Doctors: It was reported from the U.S. that a Doctor was found guilty of using bogus herbal medications to offer false hope to dozens of people suffering from diseases such as cancer and Alzheimer's;
- Dentists: Dentists have been found to have claimed for dental work which has not been undertaken; to have claimed for gold fillings which were actually mostly composed of nickel; and to have claimed fees for re-opening their surgeries out of normal hours without actually doing this;
- Opticians: Opticians have been found to have claimed fees for undertaking sight tests on people who were subsequently found to have been dead or non-existent; or to have been paid for providing replacement glasses without doing so;
- Pharmacists: Pharmacists have been found to deliberately divide up prescriptions into small packages in order to claim additional fees.

Fraud by the public and patients

- Organised criminals: criminals have been found to establish bogus medical clinics in order to bill insurers for healthcare treatments that were never provided and to have stolen confidential patient data for use in credit card fraud;
- Patients: Patients have been found to lie about their economic circumstances in order to obtain free healthcare treatment, to pretend that they are resident in particular countries where they were entitled to free treatment and to claim expenses for journeys to hospital which they never made;
- Counterfeit drugs: One example involved thousands of cancer patients being given fake drugs in a multi-million pound fraud that could have condemned them to early deaths. Bogus drugs were imported and packaged to make them look like genuine medicines for cancer, heart conditions and mental illness. They were passed to pharmacies, hospitals and care homes and at least 100,000 doses ended up being given to patients.

Fraud by contractors and suppliers

- Pfizer Inc., the drugs giant, was ordered to pay $2.3 billion in America's largest healthcare fraud settlement, for making false claims about four prescription medications. 11 whistleblowers became so concerned that the company was asking them to break the law and mis-sell the drugs that they informed the authorities;
- Drug companies: Drug companies have been found to organise cartels to restrict the supply of key drugs and to artificially raise the price; they have also been found paying bribes to medical professionals to prescribe their drugs;
- Equipment companies have been found to supply counterfeit diagnostic equipment and there is a serious global problem concerning the supply of counterfeit drugs.

It should be emphasised that there is a vast honest majority of managers, staff, professionals, patients and contractors but the dishonest minority causes significant financial losses which have a serious effect on the quality of patient care.
Healthcare fraud is a challenging problem. It has a direct, negative impact on human life with reduced resources available to fund good quality patient care. It is self-evident that unless you know the nature and scale of a problem, you cannot apply the right solution. However, historically, fraud has been described as ‘difficult to cost’ and, until relatively recently, it has not been possible to quantify these effects. Over the last decade the situation has changed.

Of course, there are still some estimates published which are simply not reliable. Counting only those losses which are detected, or surveying those working in the area for their opinion, will never be accepted as a robust measure of the real financial cost of fraud. The most recent global study, undertaken by Jim Gee, PKF’s Director of Counter Fraud Services, with the University of Portsmouth, reported the latest, accurate, statistically valid information from around the world about the real financial cost of healthcare fraud and error. It reviewed many exercises, to accurately measure healthcare fraud and error losses, undertaken between 1998 and 2009, in 33 organisations from 6 countries, covering many different types of healthcare expenditure totalling over £1 trillion in value. It found, across this massively representative sample, average losses of 7.29%.

Up to a 40% reduction within 12 months

Once the extent of healthcare fraud losses is known then they can be treated like any other business cost – something to be reduced and minimised so as to free up resources for better patient care. PKF offers a service to do just that – to measure and reduce such losses, with reductions of up to 40% within 12 months possible and a 12:1 return on the cost of the work.

Between 1998 and 2006 Jim Gee lead the NHS Counter Fraud Service and achieved just such a return.

It becomes possible to go beyond reacting to unforeseen individual instances of fraud and to include plans to pre-empt and minimise fraud losses in business plans. In almost every other area of healthcare, organisations know what their costs are – staffing costs, accommodation costs, drug costs, procurement costs and many others. Fraud and error costs, on the other hand, have only rarely had the same focus. Because of this, fraud is now one of the great unreduced healthcare costs.

...we can provide the answers

Now that we can measure fraud and error losses, we can make proper judgements about the level of investment to be made in reducing them. Now that we can measure these losses, we can measure the financial benefits resulting from their reduction. In the current tough economic climate, with pressures on healthcare expenditure, reducing these losses is one of the least painful ways of reducing costs and improving efficiency. We can help client organisations to do that as well as providing specialist training for staff to allow ongoing in-house measurement of the problem.

Find out more

The cost of PKF’s fraud loss measurement and reduction service varies. We provide a comprehensive Report indicating the losses suffered by a client organisation so that you can make an informed judgement on how much it is cost-effective to spend in reducing them.

To find out more please ring 020 7065 0557 or email jim.gee@uk.pkf.com
how resilient is your healthcare organisation to fraud?

Fraud is a problem which undermines the ability of healthcare organisations to deliver good quality patient care. It is not a victimless crime, but one which has a direct negative effect on human life.

Global research shows that healthcare fraud costs organisations an average of 7.29% of expenditure but also that this figure varies considerably according to how resilient to fraud they are. PKF (UK) LLP and the Centre for Counter Fraud Studies (CCFS) at University of Portsmouth have jointly undertaken the most extensive and most comprehensive research yet in this area and now have Europe’s largest fraud resilience database with information from public, private and voluntary sector organisations.

by combining specialist experience and academic rigour...

PKF and the CCFS represent a unique combination of specialist hands on experience and academic knowledge and rigour. Together we can offer a confidential Fraud Resilience Check service which can benchmark client organisations against both best practice and their peers. This is a low cost service which reviews counter fraud arrangements against 29 measures of resilience derived from the best professional standards. It results in the provision of a clear and concise Report detailing the findings.

The check covers
• the extent to which an organisation understands the nature and cost of fraud to it as a business problem;
• the extent to which it has an effective strategy in place which is tailored to address this problem;
• the extent to which organisations maintain a counter fraud structure which can implement this strategy successfully;
• the extent to which the structure efficiently undertakes a range of pre-emptive and reactive action; and
• the extent to which results are properly measured, identified and delivered.

...we can provide the answers
We let the data speak for itself to identify weaknesses in counter fraud arrangements and then make recommendations for improvements, based on a wealth of experience drawn from more that 30 countries around the world.

find out more
The Fraud Resilience Check service varies according to the complexity of the organisation concerned. We provide a comprehensive Report covering 29 measures of fraud resilience with clear recommendations for improvement.

To find out more please ring 020 7065 0557 or email jim.gee@uk.pkf.com
Jim Gee is Director of Counter Fraud Services at PKF (UK) LLP, the top ten accountancy and business services firm and Chair of the Centre for Counter Fraud Studies at University of Portsmouth. During more than 25 years as a counter fraud specialist, he led the team which cleaned up one of the most corrupt local authorities in the UK – London Borough of Lambeth – in the late 1990s; he advised the House of Commons Social Security Select Committee on fraud and Rt. Hon. Frank Field MP during his time as Minister of State for Welfare Reform; between 1998 and 2006 he was Director of Counter Fraud Services for the Department of Health and CEO of the NHS Counter Fraud Service, achieving reductions in losses of up to 60% and financial benefits equivalent to a 12:1 return on the costs of the work. Between 2004 and 2006 he was the founding Director-General of the European Healthcare Fraud and Corruption Network; and he has since worked as a senior advisor to the UK Attorney-General on the UK Government’s Fraud Review. He has also worked with a range of private sector companies and charities as well as delivering counter fraud and regulatory services to organisations both in this country and internationally. His work has taken him to more than 30 countries to counter fraud and he has recently been advising the Chinese Government about how to measure, pre-empt and reduce the financial cost of fraud.

Dr Mark Button is a Reader at University of Portsmouth and Director of the Centre for Counter Fraud Studies. Mark Button is a Reader in Criminology and Associate Head Curriculum at the Institute of Criminal Justice Studies, University of Portsmouth. He has also recently founded the Centre for Counter Fraud Studies of which he is Director. He has written extensively on counter fraud and private policing issues, publishing many articles, chapters and completing four books with one forthcoming: Private Security (published by Perpetuity Press and co-authored with the Rt. Hon. Bruce George MP), Private Policing (published by Willan), Security Officers and Policing (Published by Ashgate), Doing Security (Published by Palgrave), and Understanding Fraud: Issues in White Collar Crime (to be published by Palgrave in early 2010 and co-authored).

He is also a Director of the Security Institute, and Chairs its Academic Board, and a member of the editorial advisory board of ‘Security Journal’. Mark founded the BSc (Hons) in Risk and Security Management, the BSc (Hons) in Counter Fraud and Criminal Justice Studies and the MSc in Counter Fraud and Counter Corruption Studies at Portsmouth University and is Head of Secretariat of the Counter Fraud Professional Accreditation Board (CFPAB). Before joining the University of Portsmouth he worked as a Research Assistant to the Rt. Hon. Bruce George MP specialising in policing, security and home affairs issues. He completed his undergraduate studies at the University of Exeter, his Masters at the University of Warwick and his Doctorate at the London School of Economics. Mark has recently been working on a research project funded by the National Fraud Authority and ACPO looking at victims of fraud.

Graham Brooks is Course Leader for the Counter Fraud and Corruption MSc. at the University of Portsmouth. He was previously the Course Leader for the Counter Fraud and Criminal Justice Studies BA from June 2007 to March 2009, and Head of Secretariat for the Counter Fraud Professional Accreditation Board from September 2007 to March 2009. He is also a member of the Centre for Counter Fraud Studies at the University of Portsmouth. Graham has published papers on many aspects of fraud and corruption. However, he has a special interest in fraud and corruption in sport and the effect gambling has on the integrity of all sports. A book on Fraud and Corruption in Sport, (published by Palgrave in 2012) is forthcoming which addresses these issues. Graham completed his undergraduate degree at Leeds Metropolitan University in Social Policy, and has a MPhil in Criminology from Cambridge University.
// about the authors of the foreword and preface

**Dr David Evans** is Director of health systems financing for the World Health Organisation. David Evans earned his PhD in economics from the Australian National University in 1980. He started his academic career in the economics and medical faculties at universities in Singapore and his native Australia. During this time, he specialised in the economics of household decision-making in developing countries, including decisions relating to health, and worked as a consultant for WHO, the World Bank and Australian Development Assistance Agency. He joined WHO in 1990 to help develop research into social and economic factors relating to tropical diseases. In 1998, he became Director of WHO’s Global Programme on Evidence for Health Policy. Since 2004, he has been Director of the Department of Health Systems Financing.

**Paul Vincke** is a Director of Staff - General Management - Service of Medical Evaluation and Control (SECM), National Institute for Health and Disability Insurance, Belgium (RIZIV/INAMI). He obtained a degree in Criminology from the Katholieke Universiteit Leuven, Belgium. After having spent 14 years as Financial and Personnel Director of the National Pension fund for Miners, he joined the Service of Medical Evaluation and Control in the RIZIV/INAMI in 1999 becoming Director of Staff responsible for personnel, logistics and general policy. As a member of the Management team he has been directly involved in the reorganisation of the Service since 2002, aiming at the development of highly efficient systems and tools of evaluation, prevention, detection and investigation of alleged improper use of the Federal Healthcare resources by healthcare providers. This should result in active surveillance of good medical practices and establish the appropriate sanctions. Within EHFCN Paul Vincke has been Treasurer and Deputy Director-General since October 2005. He was appointed President at the General Assembly in Warsaw in 2007.
PKF Forensic Services

PKF (UK) LLP is one of the leading firms of accountants and business advisers in the UK offering counter fraud, forensic accounting, expert witness and litigation support services on a national and international basis including:

- fraud resilience checks
- fraud loss measurement and reduction
- asset tracing and confiscations
- business intelligence
- forensic IT, including data mining, data imaging and recovery
- fraud and financial investigations

www.pkf.co.uk

The Centre for Counter Fraud Studies at University of Portsmouth

The University of Portsmouth's Centre for Counter Fraud Studies (CCFS) was founded in June 2009 and is one of the specialist research centres in the University's Institute of Criminal Justice Studies. It was founded to establish better understanding of fraud and how to combat it through rigorous research. The Institute of Criminal Justice Studies is home to researchers from a wide cross-section of disciplines and provides a clear focus for research, knowledge transfer and educational provision to the counter fraud community. The Centre for Counter Fraud Studies makes its independent research findings available to support those working in counter fraud by providing the latest and best information on the effectiveness of counter fraud strategies.

www.port.ac.uk/departments/academic/icjs/CentreforCounterFraudStudies
// about the organisations who were involved in this report

World Health Organisation

WHO is the directing and coordinating authority for health within the United Nations system. It is responsible for providing leadership on global health matters, shaping the health research agenda, setting norms and standards, articulating evidence-based policy options, providing technical support to countries and monitoring and assessing health trends.

www.who.int

EHFCN

The European Healthcare Fraud & Corruption Network (EHFCN) is the only European organisation dedicated to combating fraud and corruption in the healthcare sector across Europe. EHFCN was formally established in 2005 as a result of the first pan-European conference held in London in October 2004. Its foundations lie in the European Healthcare Fraud and Corruption Declaration agreed upon by its delegates. Today, the network represents 18 member associations in 13 countries, which provide healthcare services to millions of people in Europe. EHFCN provides information, tools, training and assistance in fighting fraud and corruption as well as a platform for its members to exchange information and ideas. EHFCN is a not-for-profit organisation financed through subscription fees. Its members are healthcare and counter fraud organisations in Europe.

www.ehfcn.org

2020health

2020health is an independent, not-for-profit, grass-roots, health and technology policy Think Tank. Interested in realistic solutions we:

- Capture the insight of the National Health Service
- Shape policy with grass-roots common sense
- Ask the questions about cultural impact

2020health engages health experts and staff in the public and business sectors through research publications, discussion roundtables and public events. We aim to restore trust, confidence and responsibility to professionals and enable people to have their say through active participation and networking.

www.2020health.org
about PKF

PKF (UK) LLP is one of the UK's leading firms of accountants and business advisors and specialises in advising the management of developing private and public businesses. We pride ourselves on creating and sustaining supportive relationships where objective and timely advice enables our clients to thrive and develop.

Our clients benefit from an integrated approach based on understanding the key issues facing small and medium-sized businesses. This enables us to meet their needs at each stage of development and allows them to focus on building the value of their businesses.

The principal services we provide include assurance and advisory; consultancy; corporate finance; corporate recovery and insolvency; forensic and taxation. We also offer financial services through our FSA authorised company, PKF Financial Planning Limited.

We have particular expertise in the following sectors:

- Hotel consultancy
- Healthcare
- Mining & resource
- Not-for-profit
- Pensions
- Professional practices
- Public sector
- Real estate & construction

We have more than 1,500 partners and staff operating from offices around the country. Wherever you do business, we can offer you local expertise backed up by the resources of a national firm.

PKF (UK) LLP is a member firm of the PKF International Limited network of legally independent firms. Our membership means that we can, through collaboration with other member firms, offer sound advice on a range of international issues. Worldwide, the member firms have around 21,000 people working out of 440 offices in 125 countries, and an overall turnover of approximately US$2.4 billion.

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