

DRAFT - PLEASE DO NOT QUOTE WITHOUT THE PERMISSION OF THE AUTHORS

### *Labour Market Information and Intelligence: Embedding LMI into Training and Practice for Careers Advice*

---

**Mike Danson<sup>1</sup>, University of the West of Scotland and  
Patrick Watt<sup>2</sup>, Skills Development Scotland**

**Abstract:** Within an employability framework, this paper discusses the use of technology in supporting careers information, advice and guidance (CIAG). The recent, increasing emphasis on the role of LMI in supporting CIAG both regarding 'core LMI' for careers guidance staff and 'careers intelligence' for individuals is discussed. Such developments have been advocated in reports from the Scottish Government and UKCES, which have highlighted the importance of web tools, outlined the characteristics of good IAG and stressed the importance of LMI in the process.

Developments in Scotland have focused on pragmatic delivery. A free web-based service to support individuals in their careers choices, *My World of Work*, has been developed. A publicly-available LMI system, free at point of use, has also been introduced to support careers advisers and other SDS staff. This includes Scotland's Labour Market Intelligence Hub, *Research Online*.

Drawing on the careers guidance courses at UWS and Napier, which bring both theory and practice to the education of future careers advisers, these developments are analysed and discussed. Stronger links between the LMI team at SDS, course tutors and students have been established in Scotland, bringing together the academics and practitioners involved in careers guidance. Feedback from careers advisers themselves has indicated a high degree of satisfaction with the approach.

Overall, this suggests that any approach to developing CIAG services and training within the UK should, at the very least, examine the route adopted in Scotland.

**JEL classification:** A23; D83; J08; J68

**Keywords:** labour market information; careers guidance; web-based tools; Scotland; employability.

---

<sup>1</sup> Corresponding author:

Professor Mike Danson, AcSS, FIED, FeRSA

Business School, University of the West of Scotland, Paisley PA1 2BE, Scotland

Tel: +44 141 848 3936; Mob: 07948 276398; email: [michael.danson@uws.ac.uk](mailto:michael.danson@uws.ac.uk)

<sup>2</sup> Dr Patrick Watt, Head of LMI,

Skills Development Scotland, Alhambra House, Glasgow G2 6HS

Tel: 0141 228 2532; Mob: 07824334435; email: [patrick.watt@sds.co.uk](mailto:patrick.watt@sds.co.uk)

The views expressed are the author's own and need not represent the views of his employer.

### Introduction

In the generally accepted approach to employability developed by Hillage and Pollard (1998), there are important roles assigned to knowledge and understanding of the labour market and to the role of guidance and direction for those entering and progressing through the labour market. Diagrammatically, Henderson (2001) has demonstrated that the elements of employability are multiple, varied and complex; and that these reflect the complexity of the market which undoubtedly has become more difficult to navigate as jobs, occupations and careers have become less structured than in former generations. The very complexity associated with a flexible labour market where careers are constructed around a lifetime portfolio of jobs, employers and positions means that navigating through the lifecourse has generated new requirements for many job seekers and those for outwith internal labour markets especially.

Given the key role assigned to careers guidance in this environment, this paper addresses how efforts have been made in Scotland to embed formal training in the sourcing, analysis and application of labour market information and intelligence (LMI) for those undertaking this task. In the next section, the basic theories of information in the market and the labour market in particular are introduced. The following sections address recent policy strategies and work at the UK and Scottish government levels, and the organisational structures and initiatives in Scotland under the lead of the agency dedicated to servicing needs for information, intelligence and guidance in the labour market – Skills Development Scotland (SDS). The LMI elements of the training and education for those employed in or entering the careers guidance profession are then explored before the joint efforts of SDS and the academic institutions involved in delivering this are examined. The final section concludes by discussing the findings of the paper and contrasting the approaches in Scotland and England; recommendations are made for future developments.

### Theoretical approaches to information and LMI in the flexible economy

- **Importance of information in economics**

Of the fundamental requirements for a competitive market, perfect information is often neglected or not made explicit despite the condition this imposes on optimal outcomes. However, in recent times greater attention has been paid to both to the importance of information in the capacity of markets to allocate resources efficiently and to externalities as causes of market failures. Most obviously, asymmetric information has been identified as a root cause of potential failures in markets, especially but not exclusively in financial contexts, but more generally lack of full access to information on products, services, buyers and sellers, etc. is recognised as potentially leading to sub-optimal outcomes. For those active in labour markets, whether as employers, employees or agents, information is of more than usual concern.

- **LMI underpins labour market outcomes**

Under neo-classical assumptions of rational economic actors, information on where jobs are, on returns to investment in human capital, on trade-offs between the costs and rewards to working and benefits, etc. are all crucial in decision making in the labour market. Equally for employers of labour, data on the size and quality of the labour force, on productivity, wages and competition are significant factors in determining their demands for labour. In the framework for employability (Scottish Government, 2006) and the research

underpinning that approach to interventions to improve outcomes in the labour market (e.g. Hillage and Pollard, 1998; McQuaid, Green and Danson, 2005), therefore, information and intelligence on all aspects of jobs, occupations and sectors are given important if not critical roles (Figure 2 below, from Henderson, 2001).

- **Job search, recruitment, and choice in the marketplace**

Information has a particularly critical role to play in the labour market with regard to change or mobility; that is, it is of greatest import in dynamic situations - when entering, looking to progress, when forced to re-enter the market and actively search for work or workers. Selection amongst potential employees; establishing wage and reward rates; deciding on the channels for recruitment; and recognising the dimensions of the search area for applicants are all examples of employer needs for LMI. Mirroring most of these, on the worker's side of the market, there are issues of identifying wage and rewards from different occupations, firms and types of employment; selecting different means of searching for jobs by channel, intensity and duration; establishing skill, qualifications and other human capital characteristics likely to be demanded by employers, and so forth.

The multi-dimensional nature of these requirements for efficient outcomes to be realised has become more complex as the labour market has become more flexible and de-structured compared to former times. The need for individuals to be(come) aware of opportunities and changing requirements in the market at more stages of their working lives is now much more likely to be a lifelong characteristic of their journey through the labour market as short term contracts, portfolio careers with series of jobs, mobility between employers, occupations and sites have become far more the norm. Dynamism, insecurity and opportunities and rewards to change therefore jointly encourage this need for better and sustained LMI, whereas previous generations often entered a 'job for life' with but the one initial decision for entry to be made.

- **Employability**

Going hand-in-hand with the increasing flexibility of the labour market and labour force has been the rise of 'employability' as a key and fundamental concept and strategic policy area (McQuaid, Green and Danson, 2005; McQuaid and Lindsay, 2005). The best known approach to defining and operationalising employability has been offered by Hillage and Pollard (1998) whose framework has been applied in different contexts over the last decade or so and been adopted as the guiding model in a number of policy initiatives (e.g. and of particular relevance here, Scottish Government, 2006). For the individual, employability depends on:

- their assets in terms of the knowledge, skills and attitudes they possess,
- the way they use and deploy those assets,
- the way they present them to employers, and
- crucially, the context (e.g. personal circumstances and labour market environment) within which they seek work. (Hillage and Pollard, 1998).

In the careers guidance environment specifically, Henderson (2001) has applied the four elements of employability, as proposed by Hillage and Pollard (1998) and, beneath that, has

described the complexities of the underpinning factors in diagrammatic form (Figures 1-4). These figures are helpful in marking the extensive array of factors relevant and active in an employability-defined labour market and in highlighting the particular roles assigned for careers advisors in guiding and supporting individuals through the market (Figure 2) and for information on the relevant local labour market (Figure4), however defined.

*Figure 1: Employability – Personal Attributes*

*Source: Henderson, 2001.*

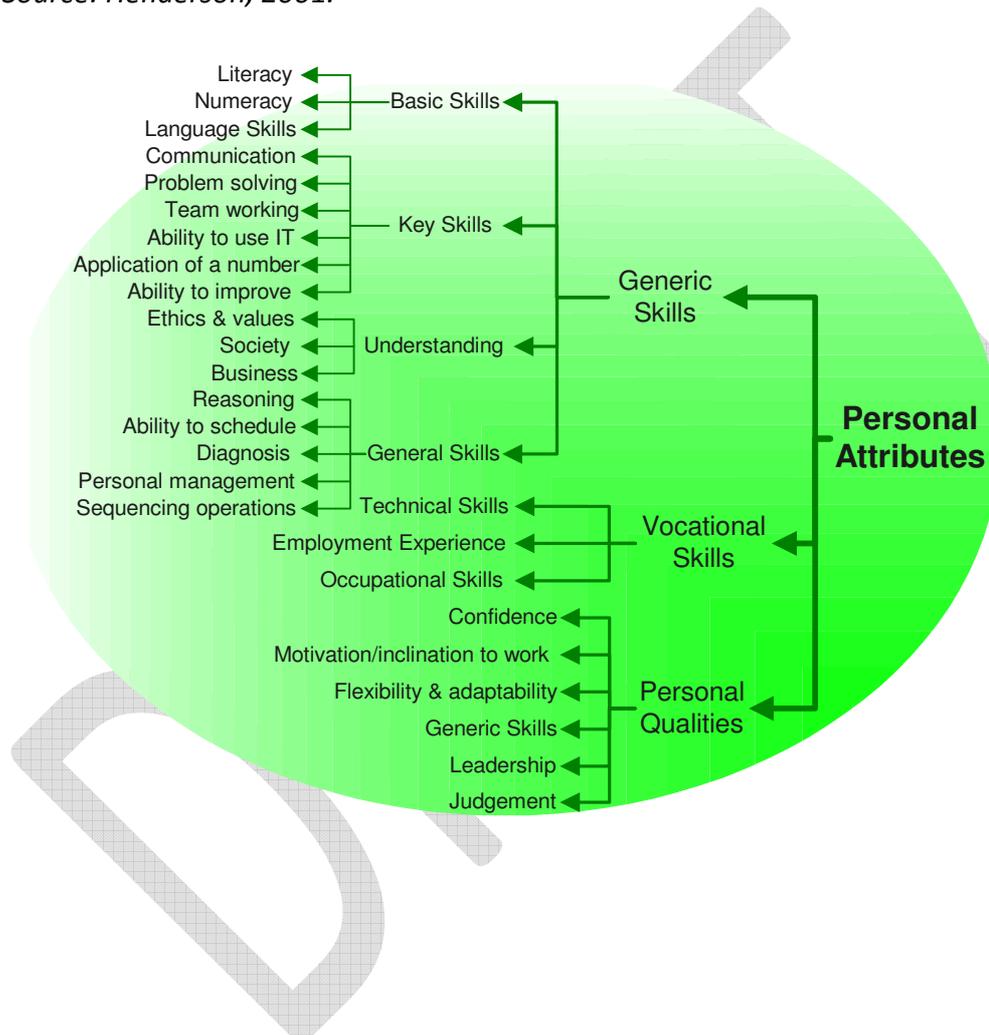


Figure 2: Employability – Managing the Labour Market

Source: Henderson, 2001.

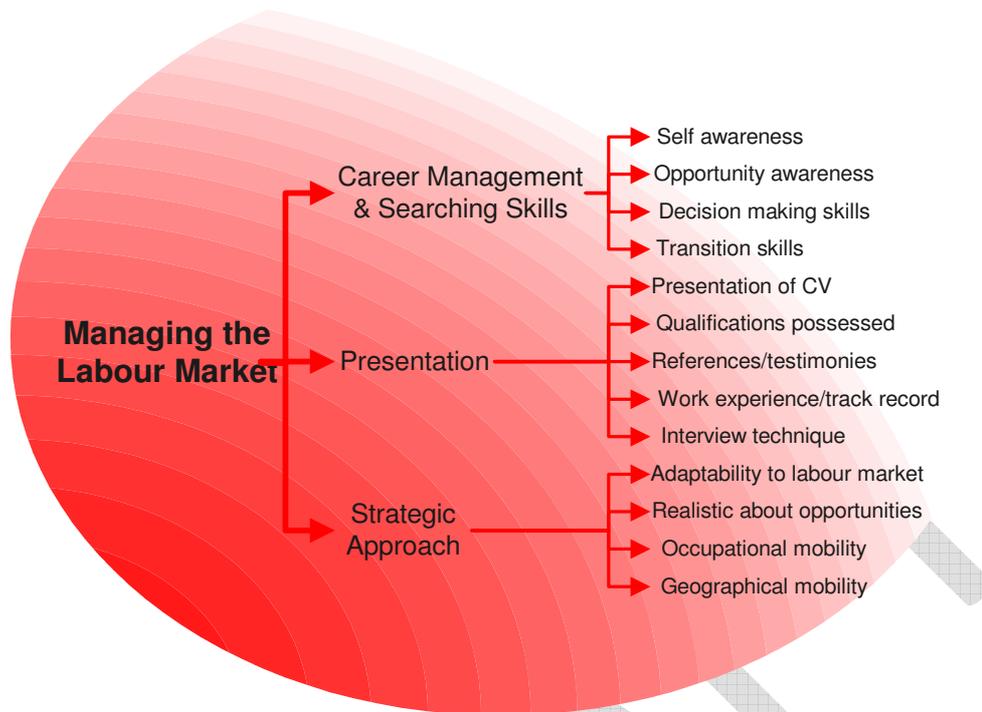


Figure 3: Employability – Personal Circumstances

Source: Henderson, 2001.

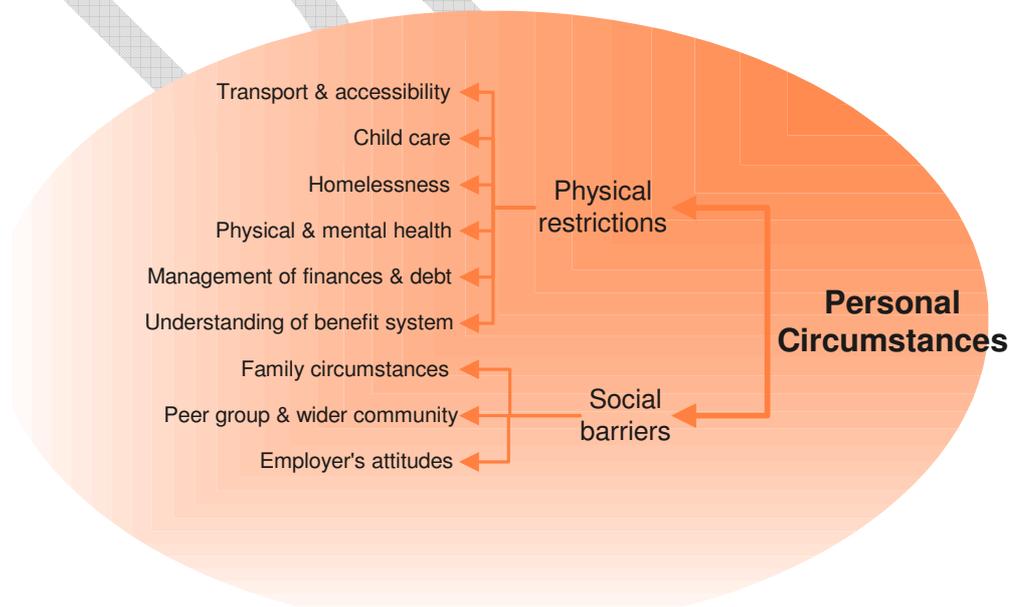
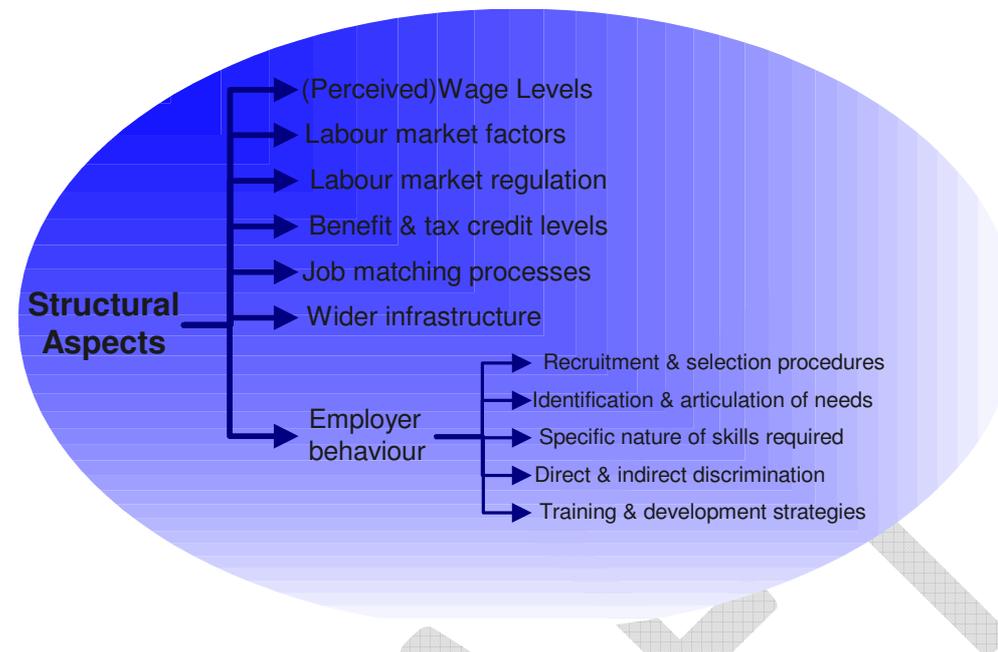


Figure 4: Employability – Structural Aspects

Source: Henderson, 2001.



- **Dependency of public and private organisations on LMI for efficient outcomes**

In the economy of the early C21<sup>st</sup>, LMI enters as a significant driver in a number of policy, strategy and operational areas of government and corporations alike. As demonstrated above, the actors tasked with supporting individuals through the labour market by offering advice and guidance on careers and job opportunities must have an understanding of and so access to the skills, tools and information necessary to deliver intelligence to their clients if informed choices are to be made. In the new public management paradigm (\*), which drives the rationale and forms of intervention by the state in markets, there is a set of assumptions on when and how Job Centre Plus, SDS and other agencies should be active in the labour market and the role of LMI in the related processes. Similarly, the rise of performance reviews, activity planning and individualised responsibility for negotiating and agreeing career and staff development are based, albeit perhaps implicitly, on an appreciation of external and internal benchmarks and assessment of peer rewards and efforts.

- **Intelligence: the capacity to interpret labour market information**

As illustrated by Henderson's graphic (Figure 2), and Hillage and Pollard's analysis (1998), being able to apply information on the labour market to achieve optimal outcomes for self and clients is a key requirement in the employability framework. Having the capacity to interpret and analyse such information and then to advise and guide accordingly to reach efficient and satisfactory moves suggests that capacities, in terms of having the skills, tools and analytical abilities to turn information into intelligence, are essential requirements for careers advisors and their equivalents. Before exploring how these are embedded into training and educational programmes for advisors, the next two sections consider the policy context, strategic approaches and organisational forms for the delivery of LMI in the UK and Scotland.

### LMI and Careers Information, Advice and Guidance

The role of labour market information and intelligence (LMI) in supporting careers information, advice and guidance (CIAG) has been something of a 'hot topic' over the previous year. The UKCES and the Scottish Government have both published core reports in this area during 2010 and 2011. In particular, there has been a focus on the opportunities provided by new technology to support the CIAG process.

One UKCES report (UKCES, 2010c) aims to explore how new technologies can be used to provide robust, accessible information and guidance. The focus is on careers information, rather than advice and guidance services. This report highlights the variety of sources and contributors and makes a number of key points:

- The separation of LMI into 'core LMI' for staff and 'careers intelligence' for clients is both insightful and helpful. This is allied with 'skills and training' - information on learning and development opportunities.
- Careers intelligence is seen as less quantitative than core LMI and, as such, more useful for users/public. Much is made of the important role of Sector Skills Councils in providing this careers intelligence.
- A strong argument is made about LMI which is theoretically of use as opposed to that which is practicably useful – reminding us of the focus for any LMI provision.
- There is much made of a market-driven approach, although this seems to reduce into the merits of a responsive 'bottom-up' system and its advantages over a centralised 'top-down' service.
- Little is made of the role of careers advisers and the need for mediation (perhaps reflecting the report's focus on careers information, rather than advice and guidance services).
- The report is largely based on the English system, with little acknowledgement of the work going in Scotland or, indeed, elsewhere in the UK.

The terms of reference for the study restrict its scope to the English context. However, there is a suggestion in the report that *'many of the findings relating to the online provision of careers information are equally pertinent in a UK-wide context'*. This may be so, but the suggestion would have been strengthened by a review of the UK situation more widely.

The report suggests that it may be attractive to build a single portal to streamline and co-ordinate public LMI gathering and dissemination. It is acknowledged that there would be significant cost in developing a portal, but also that significant resources would be required to keep it up-to-date.

The UKCES (2010a) identified eight technological trends which may impact on the delivery of CIAG. These are:

<b>Community</b>	the ability of technology to foster interaction and generate a sense of community
<b>Collectivising knowledge</b>	using technology to aggregate the opinions of many
<b>Individualisation</b>	the ability of users to personalise online content and its delivery to their preferences

## Embedding LMI into Training and Practice for Careers Advice

---

<b>Recognising time and place</b>	technology is now much more attuned to supporting real-time communication and in recognising the local aspects of exploring job and training opportunities
<b>The Cloud</b>	many applications and much data are now increasingly located off-site and often with third-party providers. This is changing how services are delivered to end-users
<b>Free (or almost free)</b>	technology has reduced the costs of development and publication, enabling a wider variety of services to be offered at a much lower cost than was previously the case
<b>Diverse yet integrated</b>	access to the internet is now integrated into a range of technologies, such as the convergence of telephone and web technology
<b>Games</b>	computer gaming is becoming increasingly pervasive across all sections of society, providing an opportunity to use games to support career learning

The recognition of the potential of technology to support careers IAG is not new. Chris Humphries, the then Chief Executive of City & Guilds (and subsequently Chief Executive of the UK Commission for Employment and Skills) identified the possibilities some time ago.

*The UK needs a much more effective, well informed and professional careers information, advice and guidance service, supported by a national interactive website of diagnostic, information and advisory functions that makes such all-age support nationally available. The technology to create such an Internet based system is now widely available and understood, and the data sources needed to inform it [described in paper], and can be extended to meet requirements as the system evolves. That system could then provide the key background information service to support locally-tailored and locally-based adult information advice and guidance services to offer additional guidance and counselling support where required.*

(Humphries, 2005, pp24)

Picking up on this theme, the new framework for career information, advice and guidance in Scotland (Scottish Government, 2011) made specific reference to SDS' new web-service, *My World of Work*, hailing it thus - '*this flagship development marks a new chapter in the delivery of Career Information, Advice and Guidance in Scotland about which we should be excited and proud*'.

The Scottish Government has restated its commitment to '*an all-age, universal careers information, advice and guidance service, with more and better support for those who need it most.*' (Scottish Government, 2011, pp3).

The key characteristics of careers information, advice and guidance in Scotland are:

<b>Confidential</b>	respect the individual's right to privacy in terms of their personal information
<b>Supporting Equal Opportunities</b>	promote equality, in accordance with the Single Equality Act 2010. That is, it must not discriminate on the basis of gender, age, disability, ethnicity, religion or belief, social

	class, sexual orientation, gender reassignment, maternity or qualifications and prior achievement
<b>High-Quality</b>	be up-to-date, consistent and accurate supporting individuals to confidently make fully-informed career choices
<b>Independent</b>	respect the preference of the individual and their freedom of career choice
<b>Impartial</b>	is driven by the interests of the individual and not influenced by funding, provider or institutional interests
<b>Informed</b>	be based on a detailed knowledge of the emerging opportunities for career development and a deep knowledge of the dynamic labour and learning markets.

It is this final characteristic which stresses the importance of LMI. The Scottish Government's CIAG Framework explicitly recognises that knowledge of the labour market and of associated learning opportunities is vital in the delivery of CIAG services.

### **Organisational structures – Skills Development Scotland**

Skills Development Scotland (SDS) is Scotland's skills agency – it is an executive non-departmental body which has four main goals:

- **Enable people to fulfil their potential** – helping individuals gain the skills, training and experience needed for successful, long-term employment.
- **Make skills work for employers** – helping employers invest in the skills of their people to further drive the innovation and productivity of their businesses.
- **Be a catalyst for positive change** – working with partners and stakeholders to get the best return for public investment in skills.
- **Organisational excellence** – structuring our organisation and developing our services to achieve our goals.

SDS has a number of key areas of activity:

- **Careers Information, Advice and Guidance**

SDS has around 1,000 frontline staff across Scotland providing independent, impartial and high-quality information, advice and guidance to individuals and businesses. Contact is made through SDS' website, by telephone or on a face-to-face basis. At both a local and national level, SDS collaborates with partners and stakeholders to ensure that services meet individuals' and businesses' needs. And that they are co-ordinated with other learning and employment service in Scotland.

For instance, in 2009/10 SDS provided support to over 15,000 school pupils deemed at risk of disengaging from learning and employment. SDS also offered support, such as key workers, guidance interviews or national training opportunities, for over 31,000 16-19 year olds were unemployed. Throughout the year, SDS saw a rise of over more than 40 per cent in the numbers of adults aged over 20 years old who used an SDS service.

SDS also undertakes the Scottish School Leaver Destination Return, the key information source on the prospects and initial pathways for Scottish school leavers.

- **Delivering the National Training Programmes**

SDS delivers the main national training programmes in Scotland – Get Ready for Work, Training for Work, Skillseekers and Modern Apprenticeships.

*Get Ready for Work (GRfW)* – GRfW helps 16-19 year olds to acquire the core skills they need to advance into further training, find a further education course or move into a job.

*Training for Work (TfW)* – TfW enables anyone over the age of 18 who has been continuously unemployed for 13 weeks or more to train in the occupation of their choice.

*Skillseekers* – Skillseekers helps young people aged 16 to 19 develop practical skills whilst working towards a qualification.

*Modern Apprenticeships (MAs)* - MAs are unique to Scotland and offer employees aged over 16 the opportunity to be supported in training by their employer.

In 2009, our key workers supported over 5,000 young people who needed focused support on leaving school. SDS was also able to support over 10,000 young people through the Get Ready for Work programme. In 2009, almost 6,000 people participated in Training for Work. Almost 4,000 young people started on Skillseekers, in areas ranging from healthcare to hairdressing, with almost 80 per cent achieving a positive outcome. Thirty-five new MA frameworks were developed by Sector Skills Councils, responding to the needs of industry. SDS increased the number of MA starts to over 20,000, considerably in excess of the Scottish Government's target of 18,500. In the process, SDS assisted 5,000 businesses across the length and breadth of Scotland.

- **Partnership Action for Continuing Employment (PACE)**

PACE is the Scottish Government's national framework for assisting businesses and individuals dealing with redundancies. This is delivered through a network of local partnerships, which involve a range of local and national agencies. SDS co-ordinates 21 response teams across Scotland. These teams offer impartial advice to businesses on avoiding redundancies in the first place, or on how to manage the process where this becomes inevitable. The response teams also provide advice, information and support to individuals at risk of redundancy, supporting their efforts to find alternative opportunities are the earliest possible stage.

In 2009/10, PACE supported over 300 companies in Scotland and almost 16,000 individuals at risk of redundancy.

- **Individual Learning Accounts (ILAs)**

The Scottish Government's ILA programme is delivered by SDS. In this programme, individuals aged over 16 and who have an annual income of less than £22k can access financial support for learning. ILA helps such individuals meet the costs of developing their skills, and so increasing their range of suitable job opportunities. ILAs help individuals boost their employability and contribute to the pool of skills available in the Scottish labour market.

In 2009/10, over 75,000 new ILA accounts were opened in Scotland, a rise of 66 per cent on the previous year.

- **The Big Plus**

Literacy and numeracy skills are vital in supporting individuals to access jobs and progress in work. They are also vital in ensuring participation in a modern society. The Big Plus is a national campaign to promote literacy and numeracy which offers free help with reading, writing and numbers. The Big Plus enhances participants' job prospects and reduces the stigma which is often associated with poor word and number skills.

In the last full year for which figures are available, almost 18,000 people sought advice from the Big Plus website, whilst over 2,500 callers were signposted to the help that they required.

- **Development Work Around the Scottish Government's Key Sectors**

SDS is working with partner organisations, the Sector Skills Councils in particular, to develop connections between industry and academia, to support career development opportunities and to develop sector-specific workforce development plans in the Scottish Government's six key sectors. These are Creative Industries, Energy, Finance and Business Services, Food and Drink, Life Sciences and Tourism.

In addition, SDS is co-sponsor of the Scottish Skills Committee, alongside the Scottish Funding Council (SFC). The Skills Committee is tasked with ensuring that SDS and SFC collaborate on a number of key skills policy areas, including skills utilisation, workforce development, improving the matching of demand and supply in the provision of learning opportunities and in simplifying the skills landscape across Scotland. The Skills Committee also has a role in stimulating debate across Scotland around these key issues.

Of particular interest is SDS' requirement for up-to-date labour market information and intelligence which it can use to support its activities. This is especially important for all staff involved in Careers Information, Advice and Guidance activities.

### **CIAG advisers – Formal Training and Education**

Training and education for those entering the profession of careers advisors is formally delivered in Scotland through a Post-graduate Diploma in Careers Guidance which is offered at Napier University in Edinburgh and the University of the West of Scotland (UWS) in Paisley. UWS also offers an MSc for graduates of the PgDip. There is an integral module of the course on 'Labour Market Studies' which complements and supplements the other more practical and theoretical elements of the degree which focus on the traditional and well-established requirements of a careers advisor. The module is structured as follows:

#### Introduction

1. Overview
2. Globalisation and change in the workplace
3. The UK labour market, employment policy and law
4. The Scottish Labour market/ Skills Development Scotland
5. The skills agenda
6. Training provision for young people and adults
7. Social inclusion and employability

8. Researching labour market intelligence (LMI)
9. Communicating LMI to clients
10. The role of LMI in career guidance and development

It is in this module, therefore, that the awareness, knowledge and skills of LMI are introduced<sup>3</sup>. The sections are delivered through the medium of research reports and discussion, based on the author's own experience of applying LMI to the world of monitoring, evaluation and analysis over the last 35 years. The assessment of the learning outcomes is undertaken through a 5,000-word research project on applying LMI to a real world situation. In this section, a description will be given of what LMI training is offered within this structure and the nature of the research project in further defining the application and use of LMI in the marketplace.

The summary of the labour market studies module with regard to LMI suggests (UWS, 2011):

- Clients need a diverse range of work related information, going beyond the range of traditional occupational handouts used by guidance workers.
- Other stakeholders such as parents, teachers, fellow professionals and employers also have information needs.
- Guidance organisations vary in the extent to which they engage with LMI, and the focus of their policy.
- Career education is an important vehicle for the dissemination of LMI.
- A strong case can be made for the importance of LMI in giving effective advice: it represents the unique contribution that career guidance practitioners can make to helping.

In the past, the information provided to clients by the career service has tended to be based around handouts on different occupations. This tended to include a broad range of information about work embracing:

**Local labour market information** – reflecting the typical client who would want to work in their own area, and mirroring the acceptance of preferences and search areas;

**Pay rates** - important as monetary rewards are a very important factor in decision making, although different pay at different levels in an organisation, progression opportunities, lack of data, and change over time can make this difficult to provide;

**Equal opportunities information** - gender, race and disability (and increasingly age) issues and discrimination in a particular industry may influence choices and opportunities;

**Skill requirements** - skill and labour shortages, skills gaps, qualification expectations of employers may all be significant;

**Entry to work and career paths once within an organisation** – internal labour markets can be relevant for some occupations, though information may be limited;

---

<sup>3</sup> This section draws heavily and directly on the course materials for this module made available online to participants on the PgDip in Careers Guidance.

**Specific employers** - the nature of their business and expectations of applicants may be important, especially in dominated local labour markets or particular occupations where monopsony employers may be concerned.

It is well recognised that clients are not the only possible user group of LMI, especially where hard-to-place, new entrants and those displaced within the market are concerned. Such groups include:

- Parents
- Teachers and lecturers
- Fellow professionals
- Employers
- Active labour market projects

Each of these may have different information needs regarding:

- The supply of labour and skills
- Changes and trends in employment
- Competitors and opportunities

Therefore, LMI requirements are diverse and a number of sources will be required to satisfy these needs. The module and project confirm that in almost all cases (especially regarding information on local employers, the impacts of recent developments, etc.) data and analysis may not be available and these will have to be generated by some means or another. In other words, primary labour market research may be required and the training is provided for this accordingly.

- **Guidance providers' policy and practice**

While the PgDip is targeted at those in or entering the Careers Guidance profession and SDS specifically, providers are likely to vary in their role in relation to LMI. The policy environment in which they work may be different (recent graduates have been initiating a careers service for graduates in Saudi Arabia, dealing with clients in Cyprus, or simply from custom and practice in an organisation. Some options include:

- **Participation in generating LMI**

Guidance providers may be involved in feeding data to organisations that collate LMI.

- **Using and distributing LMI from reliable sources**

SDS' LMI system for staff was launched in May 2010. In a very short period of time, it has become the principal source of LMI for those involved in CIAG in Scotland. Although the system is driven by the requirements of SDS staff, especially those involved in CIAG, it has been made freely available on a public basis. However, there are many other individuals and organisations active in this field. The ready availability and low cost of data, web based labour market reports and commentaries means that a wide range of guidance providers, consultants and others can undertake such activity nowadays. This very accessibility, however, can be problematic; matters of quality assurance, relevance, usefulness, understanding and comprehension remain challenging.

For both these types of users of LMI, large and small, official and private, the decision may be to generate their own intelligence that is very specific to the needs of their client group or local area. For example, in recent years, with a lack of comprehensive central data and a

pressing need for information, local authorities and NDPBs have undertaken research on migrant workers around the country; these have been one-offs in the main with limited comparative analysis so that the wider intelligence needs are also restricted. Experience has shown that a disturbingly high proportion of colleges and university departments are loathe to disclose their own market intelligence on demand for courses and so opportunities for their graduates. Where organisations conduct such research, a variety of methods is used including surveys, while the effective traditional careers service approach of company visits seems to have declined over the last decade. For Business Gateway (the local authority-based small business service), SE and HIE (with their account managed large firm support), the relationships established through these contacts can be invaluable in generating specific information and intelligence on the firm and local economy. In the case of many independent organisations and active labour market projects, however, there are limited if any links with local employers (Danson and Gilmore, 2009) and many of these and similar bodies offering guidance to clients lack the capacity to analyse or interpret their own or others' LMI.

- **No involvement in LMI**

So, often organisations involved in activities where it might be expected LMI would be useful to their own requirements and clients' may not be involved in generating nor using LMI explicitly. Some may present themselves as providing educational guidance only, and restrict themselves to the provision of information on courses. Where clients of careers guidance professionals are seeking vocational courses this can be problematic and restrictive, especially given the close relationship between skills and employment.

- **Giving only occupational information**

This appears to have been the traditional and preferred role for guidance practitioners, and dominated at least until recently. It was usually a straightforward task given the availability of occupational handouts and databases; however, other relevant and more local information was often lacking. In dominated and stable labour markets embedded intelligence in the careers service would limit the challenges this would create, but in other types of location the need for supplementary evidence would be of more concern.

- **Handling vacancies or referring directly to employers and training providers**

With changes in the labour market generally and a concomitant decline in the exclusive youth labour market, Careers Scotland<sup>4</sup> has ceased to handle job vacancies (or employed status training places) for young people and this function has reverted to Job Centre Plus. As a result, there is a break between the roots of specialist vacancy handling and the statutory guidance service for young people. Instead, there is a more diverse approach to supporting young people encompassing coaching for job searching and facilitating access to the labour market through recruitment fairs and other activities. For those young people on schemes for those not in employment, education or training (NEET) or on other active labour market projects dedicated to those disadvantaged in the labour market, LMI should be an integral element of the support offered but often this is lacking (Danson and Gilmore, 2009).

Colleges and Universities are increasingly heavily involved in making job vacancies accessible to students, and the Prospects HE website has played an important role in this for some

---

<sup>4</sup> Careers Scotland was incorporated within Skills Development Scotland when the latter was established in 2008

years. Other kinds of guidance providers (such as executive outplacement agencies, or voluntary sector social inclusion projects) may make direct referrals to employers.

- **Providing LMI related learning materials and experiences**

Extending this approach in FE and HE, careers guidance workers within educational institutions may be involved in contributing to learning programmes, or enhancing them with LMI, with employability frequently embedded into the curriculum explicitly or within subject modules. In some cases (such as the tertiary education sector), guidance practitioners may be directly delivering the learning experiences. Alternatively they may support teaching or lecturing staff to deliver career education. As suggested earlier, offering support and learning about careers is not confined to educational institutions, and LMI material may be used in programmes for the unemployed, inactive and others (Danson and Gilmore, 2009).

- **Educating and training key stakeholders (teachers/parents/employers)**

Apart from clients, other groups of service users, such as parents, teachers and project staff, have needs their own demands for LMI. Some may represent a very useful vehicle for the delivery and supplementing of LMI as they may have more contact with clients and more influence than guidance practitioners, but again their information and intelligence must be treated with caution without triangulation.

- **Evaluating the effectiveness of LMI as a means to help clients and others**

A key element in careers guidance training is in offering the skills, tools and experience of evaluation. Over time there has been greater recognition of the benefits and need for monitoring and evaluation to be an integral part of service delivery. With many labour market projects being funded by external agencies that require assessment of effectiveness and efficiency, evaluation has become the sector norm for staff in bodies with LMI activities.

- **LMI in career education**

From the above, it is apparent that individual guidance is not the only mechanism for delivering LMI. Further, and as recognised in the employability framework offered by Hillage and Pollard (1998) and Henderson (2001), empowering individuals with the capacity to apply LMI themselves is integral for many in the flexible labour market. Similarly, for those who are delivering many projects in the labour market, an understanding and promotion of the application of LMI to clients is often integral to their own work. Examples within Careers Scotland included:

**Career Box:** for school age pupils; **Make it in Scotland:** an initiative raising awareness of the manufacturing sector; and **Science and Technology Matters (STEM)** promoting science and technology in schools in response to concerns about the need for a high skilled technical workforce in Scotland.

- **Project as assessment**

The project assessment for PgDip students, and annually a significant number of SDS staff take this module on a part-time basis so that the size of this class is usually doubled or more, is set out in some detail, reflecting the importance afforded labour market studies and LMI in particular. The project is designed to raise awareness of and encourage the students to use the improving facilities on LMI in Scotland, and their own area for those who

live outwith Scotland. As part of this process, they are required to harness the skills learnt in the methodology lectures to explore the different approaches to planning and undertaking research to support their analysis of particular local and occupational labour markets. Students must demonstrate they can apply appropriate techniques and instruments to explore potential effects and reactions to opportunities in the labour market. The project aims to make them appreciate and acknowledge the policy implications of intervening in the labour market, so that a key part of the work should be identifying how a problem can be solved or opportunity addressed.

With the model Scottish approach to the provision of LMI to facilitate the study and analysis of labour market scenarios, they are directed to the Skills Development Scotland website <http://www.skillsdevelopmentscotland.co.uk/knowledge.aspx>. Noting the range of materials, links, information and tools available, they are also directed to 'Research Online' on the SDS site, as this is Scotland's Labour Market Intelligence Hub. In addition, to compare Scotland with other contexts, reference is made to the English website [www.guidance-research.org](http://www.guidance-research.org) and similar LMI sites for Northern Ireland and Wales (<http://www.learningobservatory.com/>). The EU, OECD, ILO and other international agencies provide comparable data at various levels and these are signposted also.

In particular, reference is made to:

- Individual industrial, occupational and area profiles, presenting information on a range of sectors with regard to employment, wages, etc;
- A series of the largest ever employers' surveys [in Scotland] reporting on all aspects of employment in companies but especially on skill shortages and gaps; and
- Reports on different aspects of the [Scottish] Labour Market providing comprehensive statistics and information on the position [in Scotland] drawing on many sources and studies.
- Research reports drawn from across the UK, Europe and globally.

In the case of Scotland, it is suggested downloading the underlying data from the employers' surveys and the labour market reports and analysing these further, creating maps for particular areas, etc., using tools and techniques which are introduced and made available on this website in the issues papers and guidance notes.

Students are encouraged to explore the expert briefings and other reports available from these websites and to apply them as appropriate. It is also suggested that they consider the relevance of reports and websites dealing with the supply side interventions meant to address such labour market issues as labour shortages, skills shortages and gaps, and underqualified work forces.

- **Project focus**

The project emphasis evolves annually with economic and social developments, and given the current economic recession and uncertainty in labour markets, this year, for instance, an analysis and discussion of the likely effects for a particular sector (identified in terms of Sector Skills Councils) of the recession and recovery on a particular local labour market area (LLMA) was required. Some of the priority employment, training and development issues of recent years were expected to be included; so, for instance, how relevant have the

initiatives to promote STEM subjects and careers been in protecting people and places, and how are migrant workers from A8 countries faring now.

Most importantly the assessment means a focus on labour market information and intelligence for the chosen area. Also, as a careers guidance project, the implications of the analyses and findings for the careers guidance practitioner must be explored. Whatever the particular local and regional issues uncovered, an awareness of the differences and similarities across the UK in policy, practice and institutions is required. The SDS website, allied to the others referenced, allow the research to cover the geographical areas within Scotland/Wales/Northern Ireland/England and analyse the likely targets, impacts, client groups, etc. for a specific sector taking into account such issues as the drivers for change discussed in 'Future Scenarios', Scottish Government and Scottish Enterprise (and their equivalents elsewhere) strategies, the ageing workforce, the high levels of incapacity and inactivity especially amongst older workers, and the increasing participation in higher education. So, while much of the effort in the STEM initiative has been targeted on young people, and most of the migrants are under 30, the all-age responsibilities of Skills Development Scotland are stressed in the module and it is expected that attention will be paid to the proposals to assist many of those on long term sickness and disability benefits back into the labour market ('Pathways to Work', DWP, December 2002, and the updates since), as well as efforts to encourage workforce development within existing employers.

Although this is an academic dissertation, it is confirmed that the findings could be reported to senior decision makers in the locality and inform any proposed interventions. Informed by the specific lectures on methodology and the other research-based sessions embedded into the course the focus, appropriate methodologies, approach adopted, and the data and other information needed to answer the issues raised and the questions posed are all assessed. Typically, the research will involve a literature search of academic and policy documents, identification of research questions, use of web-sites, interviews with employers/employees/training providers and, possibly, use of focus groups and surveys. An ethical approach to the research must be demonstrated. To embed the research in the field, there is encouragement to discuss specific local issues with their practice tutor/link office to find out more about a particular occupation in the local area, where appropriate.

### **Delivery & Feedback**

SDS has recently established an LMI service for staff, which acts as a complement to its *My World of Work* service for individuals. The LMI service is based on detailed discussions with SDS staff across Scotland, including careers advisers, but also incorporating the requirements of other staff. The ongoing development of the system is driven by SDS' LMI Group – a small group of around 30 practitioners – to ensure that SDS' LMI system adapts to staff feedback and changing requirements.

Although SDS' LMI system is driven by the requirements of SDS' staff, it has been made publicly available, free of charge, through the SDS website. A key principle of the system is to make best-use of existing information, such as material available from NOMIS, reports from Jobcentre Plus and sectoral analysis from the Sector Skills Councils.

The core elements of the system are:

- Monthly Unemployment Report
- Monthly Vacancy Report

- Weekly Media Monitoring of Jobs Gains and Losses by SDS Region
- *Profiles of GES Key Sectors and SSCs*
- *Local Authority Labour Market Profiles*
- *Local Authority Vacancy Profiles*
- Topical 'Quick Read' summaries
- Talking Points – expert analysis for staff
- Signposting Other Sources
- Events – *sector events and LMI induction for staff*
- Monthly LMI Newsletter – *Labour Market Focus*
- Scotland's LMI Hub – *Research Online (including fortnightly alerts)*

Induction training in the use of the system has been rolled out to staff by members of the LMI Group. Levels of staff satisfaction with the training and the LMI system are running in excess of 95 per cent.

A key element of SDS' LMI system has been to work with the University of the West of Scotland (UWS) and Napier University, the two Scottish higher education institutions offering courses in careers guidance. This includes providing training in SDS' LMI system for students. It also includes staff and students being offered free attendance at SDS' LMI events, such as joint events with the Sector Skills Councils. Not only is this closer working fostering stronger links between the academic and practitioner communities, it ensures that careers guidance students are aware of, and trained in, use of SDS' LMI system.

### Conclusions & Recommendations

The use of technology in CIAG has been advocated for a long time. And, more recently, increasing emphasis has been placed on the role of LMI in supporting CIAG. Important distinctions have been made between 'core LMI' for careers guidance staff and 'careers intelligence' for individuals.

Developments in Scotland have focused on pragmatic delivery. A web-based service to support individuals in their careers choices has been developed, *My World of Work*. A publicly-available LMI system, free at point of use, has been developed to support careers advisers and other SDS staff. This includes Scotland's Labour Market Intelligence Hub, *Research Online*.

These developments are fully consistent with the recent reports from the Scottish Government and UKCES, which have highlighted the importance of web tools, outlined the characteristics of good IAG and stressed the importance of LMI in the process.

The careers guidance courses at UWS and Napier bring both theory and practice to the education of future careers advisers. By forging stronger links between SDS' LMI team, course tutors and students, the stage is set in Scotland to bring together the academics and practitioners involved in careers guidance.

The very positive feedback from Scottish careers advisers themselves suggests that any approach to developing CIAG services and training within the UK should, at the very least, examine the route adopted in Scotland.

### Bibliography

**Danson, M. and Gilmore, K. (2009)** "Evidence on employer attitudes and EQUAL opportunities for the disadvantaged in a flexible and open economy" *Environment and Planning C: Government and Policy* **27**, 991-1007.

**Henderson, C. (2001)** "Employability - how guidance workers can contribute", presentation to Careers Guidance conference, Dundee.

**Hillage, J. and Pollard, E. (1998)** "Employability: developing a framework for policy analysis", Research Brief 85, Department for Education and Employment, London.

**Humphries, C. (2005)**, Skills in A Global Economy, Futureskills Scotland

**McQuaid, R., Green, A. and Danson, M. (2005)** "Introducing employability", *Urban Studies* **42**, 191-195.

**McQuaid, R. and Lindsay, C. (2005)** "The concept of employability", *Urban Studies* **42**, 197-219.

**Scottish Government (2006)** *Workforce Plus – An Employability Framework for Scotland*, <http://www.scotland.gov.uk/Topics/Business-Industry/Employability>

**Scottish Government (2011)** *Career Information, Advice and Guidance in Scotland A Framework for Service Redesign and Improvement*, <http://www.scotland.gov.uk/Publications/2011/03/11110615/0>

**UKCES (2010a)** *Careering Through The Web: The potential of Web 2.0 and 3.0 technologies for career development and career support services*

**UKCES (2010b)** *Labour Market Information, Information Communications and Technologies & Information, Advice & Guidance – The Way Forward?*

**UKCES (2010c)** *The Use of LMI in Online Career Direction and Learning*

**UKCES (2010d)** *Enhancing choice? The role of technology in the career support market*