

STATUS REPORT 2009



Swedish Strategy for eHealth

Safe and accessible information in health and social care



The time has come to move from words to action, and take the National Strategy for eHealth from vision to reality. The national ICT solutions which we have been preparing for many years are now in the final stages of development. They have been procured and are ready to be rolled out on a broad scale.

We thus leave behind us a period of technological development and enter the next phase, which will be focused on organisational change. The work of improving information flows and continuity of care with the help of new ICT support systems, will not be fully effective until work processes, methods and issues relating to patient/user reception are adapted to realize the potential of integrated ICT systems.

In 2009, we will take the next major step in the implementation of the eHealth strategy, namely the work of better describing the needs of county councils, municipalities and private as well as not-for-profit care providers. The purpose of this process is to develop a common description of the activities of the health and social care services, focused on the need for an integrated view of individual health and social care services. We will accordingly be stepping up our efforts, as part of this undertaking, to keep decision-makers and care personnel fully informed and to broaden and formalise ongoing dialogue with key stakeholders in the sector.

By clearly identifying issues that we cannot solve individually, we can make significant progress towards better care for patients.

The EU perspective and the international dimension will be strengthened in 2009, mainly on account of Sweden's presidency of the EU during the second half of the year, but also by virtue of Sweden's role as coordinator of the EU project epSOS. Patient mobility both between and within member states underscores the importance of strong collaboration.

We are starting to see the emergence of a modern, accessible, needs-based health and social care sector, and can now, at last, begin to meet our citizens' long held expectations of an efficient, integrated health and social care service.

Göran Hägglund
Minister for Health and Social Affairs

A strategy for the individual

The vision

Safe, accessible health and social care of high quality, based on public need, is the cornerstone of the National Strategy for eHealth. At present, the potential of ICT is not being fully exploited. The technology is not being used to help activities develop optimally, or to tailor health and social care to individuals and their needs. Nor is it used optimally to improve and enhance the efficiency of health and social care in order to facilitate planning and coordination between stakeholders. Neither has there been a consensus on how best to integrate ICT into care activities.

People today are increasingly mobile, both geographically and within and between different levels of the various health and social care services. To ensure accessible, safe and efficient health and social care provision, information about the needs and procedures of patients and users must stay with the individual, regardless of which care provider he or she is using. Quality-assured information is also essential for monitoring and following up the quality of health and social care.

Ensuring efficient information supply in health and social care will however require long-term development extended through a number of stages. It is not simply a matter of the purely technical capability of systems to work together; the information the ICT system is designed to handle – the content – must also be relevant and well-defined. National and international development work is under way in this field, but to achieve results it will be necessary to coordinate the work of a number of different stakeholders.

That is why the Swedish National Strategy for eHealth was created. Representatives of the Ministry of Health and Social Affairs, the Swedish Association of Local Authorities and Regions (SALAR), the

» Safe, accessible health and social care of high quality, based on public need «

National Board of Health and Welfare, the National Corporation of Swedish Pharmacies and Carelink drew up the strategy and agreed on a vision for health and social care suitably adapted to present-day needs and equipped for the future. The strategy was adopted in the spring of 2006 by joint decision of the boards of the then Swedish Federation of County Councils and Swedish Association of Local Authorities, and by decision of the Government. It was presented to the Riksdag in the Government communication entitled The National Strategy for eHealth.

“Appropriate ICT-based tools will help ensure that all patients receive adequate, safe, secure health care and good-quality service. Care professionals will be able to devote more time to patients and adapt care provision to individual needs. ICT will be used as a strategic tool in all areas of the care sector, and care resources as a whole will be utilised more efficiently and effectively. Citizens, patients and relatives will enjoy trouble-free access to comprehensive information on care services, health and their own health status. They will enjoy good-quality service and be actively involved in their care and treatment according to their abilities and circumstances. Health and social care professionals will have access to efficient, interoperable eHealth solutions that guarantee patient safety and make it easier for the former to



perform their day-to-day tasks. Authorities and other bodies responsible for care provision will have appropriate ICT-based tools to follow up patient safety and quality concerns, and to support management functions and resource distribution.” (Government communication No. 2005/06:139)

Development under way

Ideas about greater participation and patient safety are not exclusively a Swedish phenomenon. In the summer of 2008, the biggest-ever EU project will be launched in the health and medical care sector. Twelve member states will begin working together to establish international eHealth services and improve safety for patients receiving care in another EU country.

A number of initiatives are under way in Sweden, running concurrently with the National Strategy for eHealth and related to work on the strategy. The Government has conducted an inquiry into patient safety as part of a comprehensive review of legislation in the field. Another inquiry is looking into ways of strengthening the position of patients and their ability to influence care decisions, e.g. by means of open comparisons and greater provider diversity. The national care guarantee is being extended through legislation.

A number of projects are under way aimed at measuring, in different ways, the quality of care services in areas such as elderly care. Better reporting of results is yielding a better understanding of what kinds of health and social care work best. Better

registers will make it easier to make open care comparisons. Statistical data will be used to inform the development process. The quality-assured national medical advice and information services now available online and by telephone will be extended. In some parts of Sweden, it is already possible to book appointments with doctors and other care professionals online.

A new Patient Data Act came into force on 1 July 2008. The Act will enable care professionals to digitally access a patient’s entire care history from different levels within the health and medical care services. The Act now provides for nationwide access to locally stored information. The Social Services Personal Data Inquiry (S 2007:09) is currently reviewing the treatment of personal data in the social services. Its terms of reference particularly emphasise the need for data that will enable care professionals and others to follow up activities and form a coherent picture of how the services work for different client groups such as children and young people, the elderly, disabled people, substance abusers and women exposed to violence. It is immaterial in this connection whether care is provided by the social services or the health and medical care services; the aim here is to achieve better coordination and cooperation in the care sector as a whole and to put the needs of the individual first.

The care services

The various principals responsible for the care services operate under different conditions and have made varying degrees of progress in harness-

» To achieve maximum benefit from the National Strategy for eHealth, work must proceed concurrently and be coordinated «

ing ICT to support and develop the services. Their interest in and economic and organisational capacity to implement the eHealth strategy also vary. Successful implementation will require cooperation between bodies at national, regional and local levels, i.e. between the Government, municipalities, county councils and private care providers. Two stakeholders will determine how quickly the eHealth strategy is implemented: a) the time needed to develop and prepare the national services for implementation, and b) how rapidly the care sector can introduce them. It involves cooperation between several parties whose primary task is to create the right conditions, while service providers exercise their responsibility for implementation.

If all stakeholders are to be able to handle and exchange information with one another and with external parties, all health and social care principals and providers must implement and finance measures designed to make local and regional ICT solutions compatible with national regulations and services. Although implementation of the eHealth strategy is a collaborative effort, it is the service providers themselves that make implementation possible.

The Government has an important responsibility here, namely to encourage, coordinate and support development in order to facilitate implementation. Implementation will be most effective at local and regional level, where the responsibility rests with the services themselves. Although synchronising the supply of information in the health and social care sectors is an intricate task, many stand to gain by it: members of the public, health and social care professionals, those responsible for care provision and decision-makers. It also yields benefits in the form of better, safer health and social care, improved support for personnel, a better working environment, and more effective management and follow-up of activities.

Implementation

The National Strategy for eHealth identifies six action areas. Efforts at national level to facilitate safe and efficient use of ICT in health and social care will be focused on these areas. Legislation and regulations will need to be revised. It will be necessary to define a common information structure and to further develop the technical infrastructure. In addition, steps must be taken to improve the usability of the system, provide access to needed information and ensure that this information is accessible to the general public.

To achieve maximum benefit from the National Strategy for eHealth, work must proceed concurrently and be coordinated in all these areas. If ICT solutions are to yield benefits within the required time frame, decision-makers must be committed and result-focused, and able to exercise strategic control of the expansion of ICT use by county councils, municipalities and private care providers. The stakeholders involved are collaborating in various ways and have made varying degrees of progress.

County councils: All county councils have formally adopted the National Strategy for eHealth and drawn up a joint action plan towards its realisation. Collaboration takes place through SALAR's commissioning entity, the National Centre for Coordination of eHealth.

Municipalities: By the autumn of 2008 fewer than half of all municipalities had adopted or applied the eHealth strategy. SALAR has accordingly drafted an action plan providing for broad collaboration between municipalities in 2008.

Private health and social care providers: Private providers also need to exchange information with one another as well as with stakeholders in the public sector. Representatives of private care providers have therefore been invited, through the Association of Private Care Providers, to take part in the work of SALAR's commissioning entity.

Current status and future developments

We are progressing from a vision with a number of stated goals towards the realisation of the National Strategy for eHealth. The challenge that lay before us – to create an efficient and effective system for the supply of information to the Swedish health and social care services – is approaching realisation.

For a number of years, the strategy has served as a national coordination locus for the creation of an efficient and effective information supply to Sweden's decentralised health care and social services. Structured, clearly defined and overviewable information is needed in the individual health and social care process.

- Responsibility for health and social care is decentralised to regional and local government level, namely the county and municipal councils, the bodies responsible respectively for health care and social care provision. These bodies can either choose to deliver the care themselves, or use private companies, cooperatives or non-profit organisations (NPOs). The proportion of health and social care provided by private care providers is growing rapidly. Modern health and social care are based on collaboration between different personnel categories and different types of health and social care.
- Patients and users have steadily gained a bigger say in the content of health and social care and are increasingly able to influence the choice of provider. The continuing trend towards greater patient and user influence has generated a growing need for comprehensive information as the number of care options and providers increases. Patients and users must have easy access to accurate and comprehensible documented information about them.
- Control and follow-up of the quality, results, accessibility, costs, etc. of health and social care is essential. This is even more important in a system where health and social care are decentralised and financed by the taxpayer. An important follow-up tool is information that allows fair comparisons. This presupposes consistent documentation of information about patients, users and measures taken. The development projects now under way are based on this perspective.

The work of implementing the eHealth strategy is based on the premise that stakeholders must be able to exchange, or have common and secure access to, necessary information. At the same time, security must be such that information can only be accessed by authorised personnel. Patients and users must

have the right to access and view any information compiled about themselves. A number of projects are now in the final stages of development and some are in the process of being implemented.

A number of important milestones have now been reached, which will enable us to implement and launch other development projects. These achievements, which are of a technical nature, are mainly concerned with security, such as the ability to verify that a person has the right authorisation at the right place and time. The Patient Data Act, which took effect in 2008, constitutes an important change in the law and is essential to the completion of certain ongoing projects. It has also enabled certain other projects to get under way. In addition, a national patient summary that can provide relevant information about patients is now in place. This has been procured and is available for organisations wishing to deploy it in their operations. The project to develop a national information structure – a description of the type of information needed and how it is to be structured so that it can be interpreted in a given context – is now in its final stages. The outcome can be used as a basis for identifying the need for information in connection with new or updated ICT solutions.

This year's status report provides a more extensive account of the work on the eHealth strategy undertaken by the municipalities. Our ambition for 2010 is to complete a revision of the strategy aimed at adapting it more closely to the increasingly intensive strategy work under way in the municipalities. A comprehensive review encompassing all service providers is needed in order to ensure that these are all represented in the strategy.

The National Steering Committee for ICT in the Health Care and Social Services has been reorganised ahead of 2009. Its tasks have been streamlined and will focus on strategic issues and options. A new drafting body in the form of a national consultation group has been created to broaden and formalise dialogue with key stakeholders in the health and social care sectors. The group will act on the mandate of the National Steering Committee and report to it. The Government will be setting up an e-delegation as part of ongoing eGovernment work. Among other tasks, this body will be concerned with ICT standardisation, an important area to monitor in the context of the eHealth strategy.

The National Strategy for eHealth has identified six action areas on which efforts at national level will be focused in order to facilitate safe and efficient use of ICT in health and social care, as follows:

**CITIZEN,
PATIENT, USER**



**HEALTH AND SOCIAL
CARE PROFESSIONALS**



1177

**Access – internet portal
Health information
AdviceServices
UMO.se**

**Action Area 6
Accessibility for citizens**

**Information systems and process support
Electronic Health Record (EHR)
Administrative support systems
Decision support
Prescription support
National Patient Summary**

**Action Area 5
Access to information across
organisational boundaries**

**Action Area 4
Supportive and interoperable
ICT systems**

**Communications networks
Electronic directory
Identification
Authentication
Handling consent
Logging
Information structure**

**Action Area 3
Technical infrastructure**

Standards

**Action Area 2
Information structure**

**Regulatory framework
Laws and regulations**

**Action Area 1
Laws and regulations**

Forms of collaboration

When the National Strategy for eHealth was adopted at national level, neither the county councils, the municipalities nor private providers had organised collaboration of the type and scope required by the strategy. Since the strategy's adoption, the Swedish Association of Local Authorities and Regions (SALAR) has sought in a number of ways to establish and strengthen collaboration between county and municipal councils.

The result of this collaborative effort is now becoming apparent as a number of development projects are completed and come into operation in 2009. The projects pursued have been accepted by all the parties concerned on the basis of a common point of departure and thanks to continuous efforts to mobilise support for ongoing work. This means that fully-developed projects can now be implemented within the organisations and services concerned.

The county councils

All county councils have adopted the National Strategy for eHealth as well as a common action plan for its implementation. County council collaboration takes place within the framework of the National Centre for Coordination of eHealth at SALAR, the commissioning entity which drafts the assignments the county councils have agreed on, and draws up contracts for their implementation. This entity was established in 2007 to coordinate common information and ICT services as defined in the eHealth strategy. Confronted by major national challenges with respect to ICT in health and social care, the boards of the then Federation of Swedish County Councils and Association of Swedish Local Authorities concluded that a joint endeavour would be necessary.

The company Sjukvårdsrådgivningen SVR AB, which manages and develops eHealth solutions, is jointly owned by SALAR. Following the establishment of the National Centre for Coordination of eHealth at SALAR, Sjukvårdsrådgivningen SVR AB has focused primarily on development and management tasks. Strategic collaboration with external stakeholders and the drafting of directives for assignments take place through the commissioning entity. The company is represented in a number of drafting groups within the commissioning entity. The web-based service Sjukvårdsrådgivningen.se changed its name to i177.se in the autumn of 2008.

Action plan for the municipalities

Although, progress in the municipalities has been slower, a follow-up questionnaire-based survey con-

ducted in December 2008 showed that 90 per cent of the country's municipal councils are now familiar with the National Strategy for eHealth. Of 290 municipalities surveyed, 207 responded that they had adopted the strategy.

An action plan has been drawn up identifying the three action areas most in need of national collaboration. These are:

- Organisational measures to facilitate exchanges of experience and collaboration on ICT tools of common interest.
- Information structure, and standards for information documented by municipal health and social care services.
- Technical infrastructure for secure login and communication based on digital identification.

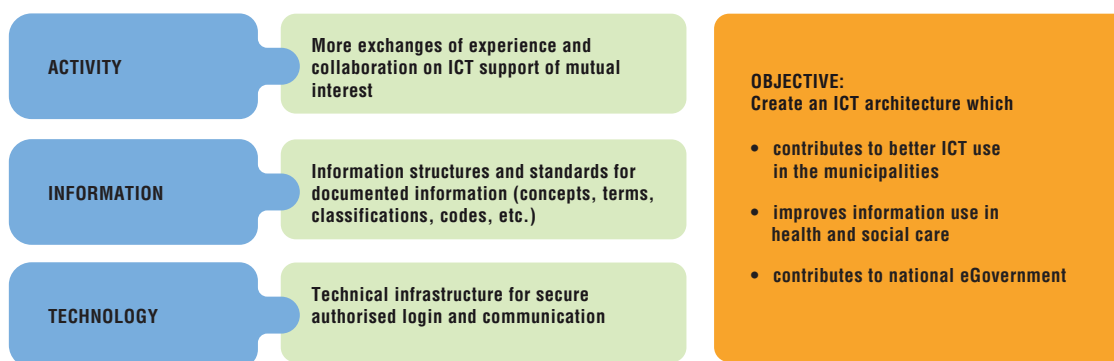
2008 saw the emergence of established collaboration at municipal level, in which three quarters of the country's municipalities now take part. Most have organised this collaboration through their local association of municipal councils; others have done so via ICT forums, ICT councils or through local networks together with county councils. A number of municipalities engaged in introducing user-choice systems have joined forces to stimulate development of more appropriate ICT-based support for their role as the responsible authority in municipal health and social care. The Stockholm region has for example, begun cooperating with the county council to create 'one door in' to health and social care for all municipal residents. A project to develop coordinated information management, known as the child health data project, is ongoing in paediatric and school health care.

Several other municipalities have joined forces with county councils to develop ICT tools for joint care planning to provide access to the same information. It is primarily the large municipalities which are moving in a clearly positive direction. In the smaller municipalities, there has been no real change in the same period. There is a clear connection between a municipality's size and its ability to adopt and integrate eHealth solutions into its operations.

In 2007–2008, SALAR, with the support of a group of municipal directors, drew up a report contain-

» Of 290 municipalities surveyed, 207 responded that they had adopted the strategy. «

Focus and objectives of municipal ICT collaboration



ing a number of proposals aimed at establishing and strengthening organised collaboration between municipalities and between municipalities and county councils on information supply and ICT support. A special office will be established in 2009. Its task will be to strengthen and coordinate existing ICT collaboration on health and social care between municipalities and between municipalities and county councils in the context of eGovernment and the introduction of the strategy for eHealth.

Private care providers

The number of private care providers has increased in recent years. This trend is certain to continue. As their operations form an integral part of the Swedish health and social care services, they must be able to exchange patient data with one another and with public providers on the same common basis. Private providers have accordingly been invited, through the Association of Private Care Providers, to take part in the work of the National Centre for Coordination of eHealth at SALAR.

National level

It is essential that efforts at national level be efficiently managed and coordinated. All national assignments must be clear, enjoy broad support and be drawn up in close dialogue with the principals and providers of health and social care. Similarly, progress in the national projects must be reported on an ongoing basis to all stakeholders. Efforts at national level are contributing in a number of ways to speed up implementation of the eHealth strategy and make it more effective. In its annual negotiations with county councils, the Government has allocated substantial funds to development projects within the eHealth strategy framework. Those projects which have received financing to date have focused on development in basic ICT structure, such as essential information systems and infrastructural support services. However, it should be mentioned, for example, that funding in 2009 has been allocated to projects intended to foster intra-regional municipal collaboration aimed at strengthening care continuity, thus

reflecting a shift towards an individual perspective.

Care services work and exchange information with a number of government agencies in various fields on an ongoing basis. Improved communication and information exchange with these bodies is crucial to the quality of care, service to patients and resource utilisation in the care sector.

The National Board of Health and Welfare, which has a special responsibility in this connection, will assume overall national and strategic responsibility for ensuring that individual-based patient and user information is made clearer, easier to follow up and more accessible. The assignment is being implemented in two projects: The National Information Structure (2007–2009) and the National Project for an Interdisciplinary Terminology (July 2007–March 2011). The work is being undertaken in close collaboration with SALAR, health and social care principals and other stakeholders in the health and social care sectors. These projects are fundamental national undertakings that will not only set new standards for information structure and terminology in the sector, but also help ensure that future development work is carried out within a common framework.

The National Steering Committee on ICT in the Health Care and Social Services

A national ICT steering committee has been established to coordinate ongoing work. The committee, on which all the stakeholders concerned are represented, will focus on strategic issues and options relating to the National Strategy for eHealth. It will also function as a body for joint decision-making on matters concerning the direction of future work within the framework of the strategy. The committee is composed of representatives of the Ministry of Health and Social Affairs, the National Board of Health and Welfare, SALAR and the Association of Private Care Providers. A new drafting body in the form of a national consultation group has been created to broaden and formalise dialogue with key stakeholders in the health and social care sectors. The group will act on the mandate of the National Steering Committee and report to it.



Work in progress

A growing number of individuals have health and social care needs that require coordinated inputs from several providers. This in turn calls for access to reliable information. Managing and directing activities requires access to comparable data. Members of the public want access to the information that is generated whenever they come into contact with the health and/or social care services. Information of a more general kind is also sought. All documented information must therefore be relevant and accessible (i.e. usable) to various stakeholders in a wide range of contexts. The success of the National Strategy for eHealth will ultimately be measured by its impact, primarily the benefits it brings in terms of better and safer care for patients, improved support and working environments for care professionals, and better management and follow-up from a wider societal perspective.

Links and interdependencies

The ongoing development projects will result in a number of national services, which are intended to work in tandem, either as support services or to be used in parallel. They will be introduced and function in existing 'local' ICT environments in county councils, municipalities and care units. This will normally entail changes and adaptations to local systems and operating environments. Overall, these adaptations will involve a significantly greater commitment and cost than the work of developing and completing the national services. The requirement that the national services be interoperable and be introduced in all local ICT environments in health and elderly care has created a need for a nationally established regulatory framework – a national architecture – comprising regulations, guidelines and recommendations for the coordination of ICT support.

Patient rights

The Government's active concern to strengthen the rights of patients has resulted inter alia in the development of 'care choice models'. Such models will give patients and users of the health and social care services the right to choose from different providers, while the providers themselves will have free right of establishment in order to increase the range of options open to patients and users, health and social care will thus be adapted to the needs of the individual. The changeover to a care choice scheme will generate greater need for common access to information about patients and users, as well as for comparable information on the results and quality of health and social care provision, thereby providing a basis for choice.

An official government report (SOU 2008:127) on patient rights was issued in 2008. The report, which proposed statutory regulation of the care guarantee and free care choice, is expected to enter into force in 2010, and will in turn affect work on information supply to the general public and within the care services.

In 2008, the Government presented an action plan for the development and introduction of a national, coordinated eGovernment programme for activities in the public sector. An e-delegation tasked with boosting the effectiveness of eGovernment will be appointed in 2009. It will also be required to coordinate ICT standardisation within the government administration in close collaboration with SALAR. Its work may entail adaptation of the ICT infrastructure and ICT-based services in the health and social care sector.

Projects ready for delivery

An interlinking ICT structure is being assembled step by step. The longer this process continues the more beneficial effects it will have. A number of development projects undertaken in the various action areas are now ready for commissioning. The task of the principals will now be to initiate a phased implementation of the services which have been developed.

The Patient Data Act

The new Patient Data Act, which came into force on 1 July 2008, will accelerate development towards coordinated record-keeping. In brief, this means that authorised personnel can, with the patient's consent, digitally access information held by other care providers across organisational borders. It also provides scope for the development of common databases, strengthens patient safety and opens up new avenues for research, follow-up and evaluation. The new Act will have the effect of renewing the information process as a whole.

Common information structure

Among its government-assigned tasks in connection with the strategy for eHealth, the National Board of Health and Welfare has been instructed to develop a definition of appropriate health and social care documentation. The assignment will be carried out in two projects; the National Information Structure (NI) and the National Project for an Interdisciplinary Terminology.

SALAR has established an Architecture Steering Group, which will support the national projects forming part of the eHealth strategy. An expert group on applied information structure (TIS) within the Architecture Steering Group will design an applied information structure for care documentation based on the National Information Structure in collaboration with the National Board of Health and Welfare.

Close collaboration has been established between the National Information Structure, the National Project for an Interdisciplinary Terminology and the Architecture Steering Group. These undertakings and their results will serve as a basis for the development of a common regulatory framework that will specify how information is to be described, documented and handled. This in turn will facilitate the development of efficient and effective ICT support and efficient information supply.

Uniform, consistent descriptions of activities to

be supported by ICT are crucial to the development of supportive, interoperable ICT solutions. These include descriptions of objectives/targets, processes, flows, basic terms and concepts, and information needs. This overall activity analysis is being undertaken as part of the National Information Structure project.

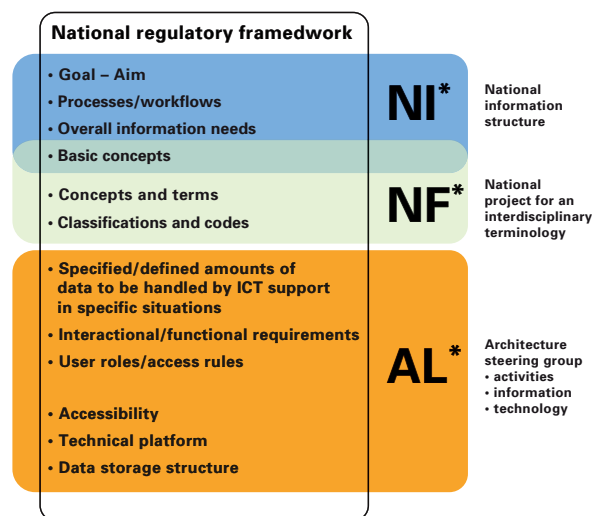
To fill the information structure with content, a technical nomenclature is required. The various components of this language include terms and concepts, classifications and codes, and the international terminology system SNOMED CT. This development task will be undertaken by the National Project for an Interdisciplinary Terminology.

Closely linked to the overall activity analysis and terminological project is an ongoing project aimed at translating the information structure and terminology into ICT solutions. This project, which is the responsibility of the Architecture Steering Group, involves specifying the amounts of information that will be handled by ICT support systems, and describing functional requirements and access rules.

Work on the national information structure is expected to be complete by the end of 2009. A number of draft models of the structure as well as knowledge compilations linked to the development work will be delivered in the course of the project.

The National Patient Summary

Patients nowadays often receive care from more than one health and/or social care provider, each of which registers and stores its information records locally.



*NI Nationell Informationsstruktur

NF Nationell fackspråk för vård och omsorg

AL Arkitekturledningen



with the National Board of Health and Welfare, the Data Inspection Board and other projects forming part of the National Strategy for eHealth.

Web-based youth family planning clinic

The web-based youth family planning clinic (UMO) is a national scheme for young people aged 13–25. The website is designed to make it easier for young people to find relevant, up-to-date, quality-assured information about sex, health, relationships, lifestyle issues and other matters of relevance to them. UMO is actively engaged in promoting equal conditions for young people and in broadening the range of opportunities open to them. It aims to impart knowledge and a stimulus to reflection, and thus enable young people to exert real influence on their circumstances at home, in relationships, at school and at work.

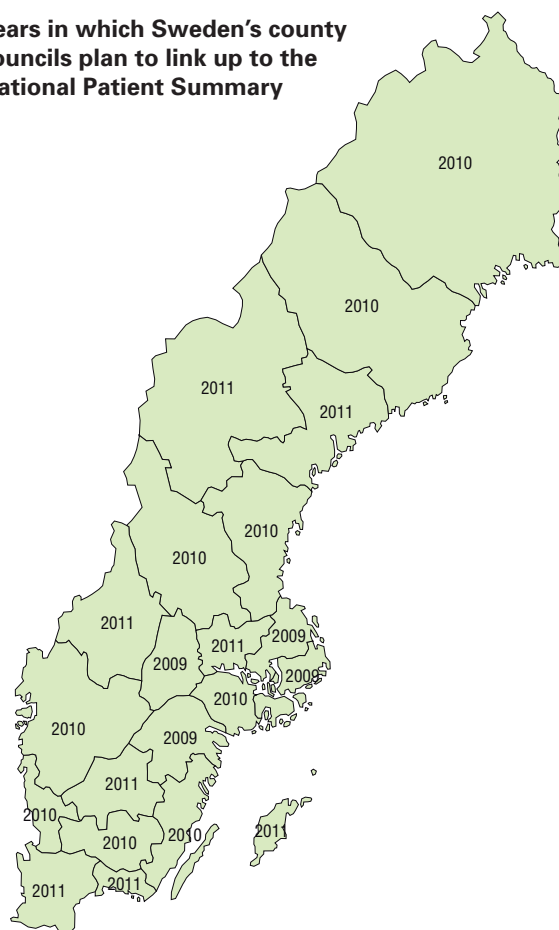
UMO's continued development is a collaborative undertaking involving Sweden's young people, the country's youth clinics, school health care, stakeholder organisations and others who work with young people. The website UMO.se was developed with the help of government funds and launched in November 2008. It immediately attracted considerable attention and a large number of visitors. Responsibility for financing its operation and administration in the coming years will rest with the county councils.

As this makes it difficult to obtain an overall picture of the patient, uncertainty about medical assessments and new contacts with providers may arise. The National Patient Summary service enables authorised users to find and view important patient data registered in the various care systems at county councils, municipalities and private care providers, provided the patient gives his/her consent. Important information such as diagnoses, test results, previous medical prescriptions and care plans become available to all subscribed principals via a web interface.

Procurement of the National Patient Summary was completed in April 2008. The first authorities to subscribe to the service were the Örebro county council and municipality, which will be conducting trial operations in a real environment in 2009. The work undertaken in Örebro will yield important observations, specifications and checklists, which will help ensure a smoother transition when the next principal links up with the service.

Considerable interest has been expressed in the service and discussions are currently being held with a number of principals. Within a few years, all the country's 21 county councils and regions will be linked up. Work on the national roll-out plan is taking place alongside efforts to further develop and evaluate the service. Development work, tests and trial operations are taking place in close collaboration

Years in which Sweden's county councils plan to link up to the National Patient Summary



In the Swedish Strategy for eHealth, the necessary measures are divided into six action areas. If the intentions of the strategy are to be realised, work must proceed concurrently and be coordinated throughout.

Work to adapt legislation and regulations to greater ICT use is particularly important, as is work to create common technical and information infrastructures. This work is intended to combine to create a basic support structure as a basis for other measures involving process-supporting ICT solutions and applications providing access to information.



ACTION AREA ONE

Bringing laws and regulations into line with extended use of ICT

In Swedish primary health care, 100 per cent of all medical records are digital. The corresponding figure for hospitals is 88 per cent. However, legislation has hitherto prevented the exchange of this information between different providers of health and social care. The Patient Data Act entered into force on 1 of July 2008. Now the information will follow the individual between regions, between different levels in the care system and between health care and other types of care.

PATIENT DATA ACT

The new Patient Data Act, which replaced the Health Records Act and the Care Registers Act, came into effect on 1 July 2008. The aim was to establish clear rules designed to ensure secure and efficient handling of personal data while improving patient safety and strengthening personal privacy. The Act represents a modernisation of existing rules on the handling of information about a patient by the health and medical care services. It also enables health and social care professionals to digitally access a person's

full history from care providers at different levels of the health and medical care system. At the same time, the Act strengthens the framework for citizen engagement and participation by enabling citizens to determine, upon mutual consent, who is to be given access to their overall medical record. Citizens will also have direct digital access to their own information and the right to view a log showing what personnel have had access to their record.



TOOK EFFECT ON 1 JULY 2008.




ACTION AREA TWO

Creating a common information structure

The information handled in health and social care is a resource of long-term value and benefit. It will be made available to health and social care personnel and to the citizen for use as a basis for decisions, for management and follow-up activities and for research. This is contingent on a national information structure that ensures that the correct information is documented and put into context.

NATIONAL INFORMATION STRUCTURE (NI PROJECT)

Uniform, consistent descriptions of activities to be supported by ICT are crucial to the development of supportive, interoperable ICT solutions. These include descriptions of objectives/targets, basic values, processes, flows, basic terms and concepts, and information needs. This overall activity analysis, which is being undertaken as part of the National Information Structure project, must furnish the basic preconditions for appropriate health and social care documentation and the development of process-supporting ICT solutions.

 PROJECT COMPLETION DATE: 2009.

ARCHITECTURE STEERING GROUP

SALAR has established an Architecture Steering Group, which will support the national projects forming part of the eHealth strategy. An expert group on applied information structure (TIS) within the Architecture Steering Group will design an applied information structure for care documentation based on the National Information Structure, in collaboration with the National Board of Health and Welfare. Closely linked to the overall activity analysis and terminological project is an ongoing project aimed at translating the information structure and terminology into ICT solutions. The project, which is the responsibility of the Architecture Steering Group, involves specifying the amounts of information that will be handled by ICT support systems, and describing functional requirements and access rules.

 THE PROJECT MOVED INTO AN ADMINISTRATIVE PHASE IN 2008.

NATIONAL PROJECT FOR AN INTERDISCIPLINARY TERMINOLOGY (WITH SNOMED CT)

The National Project for an Interdisciplinary includes recommendations and standards setting for concepts and terms, national and international classifications, and the international nomenclature system SNOMED CT. The system organises terminology so that it can be adapted for use in a digital environment. Translated into Swedish and adapted to Swedish conditions, it will help generate less ambiguous and more measurable information.

 TRANSLATION SCHEDULED FOR COMPLETION IN 2011.


CARE INFORMATION IN THE POPULATION REGISTER

This project will improve the quality and service level of information exchange between the care system and the Tax Agency's population register. It will lead to greater patient safety and better service by improving the quality and relevance of basic personal data, as well as boost the efficiency of patient administration and reduce resource consumption.

 COMPLETION NOT EARLIER THAN THE END OF 2009.

NATIONAL FORMAT FOR ePRESCRIPTIONS

The project will develop, establish and support the introduction of a national ePrescription format adapted to the basic requirements and regulations currently being established for care information management. The aim of the project is to achieve greater patient safety, better quality and improved functionality in drug prescribing.

 UNDER INTRODUCTION. THE PROJECT WILL MOVE INTO AN ADMINISTRATIVE PHASE IN 2009.



ACTION AREA THREE

Creating a common technical infrastructure

A common and overarching technical infrastructure will facilitate communication, access and the sharing of sensitive information between involved and authorised actors. Citizen contacts with health and social care will also be simplified and personnel and managers in health and social care will have better access to national registers and databases to facilitate reporting and communication.

SJUNET

A national network for all digital communication in the care sector, SJUNET, is building a platform for secure communication over organisational boundaries and geographical distances.

L ONLINE IN ALL COUNTY COUNCILS; CAPACITY AND FUNCTIONS TO BE UPGRADED ON AN ONGOING BASIS.

THE HEALTH SERVICES ADDRESS REGISTRY (HSA)

The information on personnel duties and tasks supplied by the HSA catalogue services serves as a basis for individual authorisation to register and to read confidential information.

L INTRODUCTION IN PROGRESS ON A BROAD FRONT IN COUNTY COUNCILS AND A NUMBER OF MUNICIPALITIES.

SECURE IT IN HEALTH SERVICES (SITHS)

Along with HAS, SITHS provides the framework needed for secure communication of sensitive information. SITHS is a national service responsible for issuing e-certificates. These enable care professionals to confirm their identity and authorisation.

L INTRODUCTION IN PROGRESS ON A BROAD FRONT IN COUNTY COUNCILS AND A NUMBER OF MUNICIPALITIES.

BASIC SERVICES IN INFORMATION MAINTENANCE (BIF)

BIF is responsible inter alia for supplying the role and authorisation management services for secure information handling across organisational boundaries in the care sector as required under the Patient Data Act. These services require the use of SJUNET, HSA and SITHS, and contain supplementary functions for validation, consent, access control, traceability, logging and log analysis.

L PROCUREMENT ROUND COMPLETED IN THE SPRING OF 2008, ALL COUNTY COUNCILS INVOLVED.

STANDARDS FOR ELECTRONIC INTEROPERABILITY IN HEALTH CARE AND SOCIAL SERVICES

The service provides a regulatory framework for the creation and interpretation of information so it can be exchanged and used jointly by the health and social services without risk of misunderstanding. More reliable, clearer and more useful information will help improve patient safety and reduce resource consumption.

L IMPLEMENTED.

VIDEO/DISTANCE MEETING SERVICE

Up to 12 people/workplaces can take part in a video conference at the same time. The service will mean time and cost savings for personnel and health/elderly care services, better accessibility and faster action.

L IMPLEMENTED.



ACTION AREAS FOUR AND FIVE

Facilitating interoperable, supportive ICT systems

ICT use varies across and within the operations of health care principals. The objective is ICT systems with good interoperability that allow the exchange or sharing of information, that are user-friendly for personnel and do not disturb the dialogue with patients, that provide information and knowledge support to safe and secure medical treatment, and can communicate with surrounding ICT systems.

NATIONAL PATIENT SUMMARY (NPÖ)

This project is designed to provide access to safer and more comprehensive support data for the care of patients, facilitate follow-up of care measures and reduce the cost of locating and reading important patient information. The service is intended to facilitate access to important information about patients who have received care from other care providers, including other county councils, private providers and municipalities. In the long term, authorised care providers using the BIF services (see Action Area 3) will be able to locate and read relevant patient information, regardless of where in the country or in which part of the care sector it is. The service will provide information about current care contacts, chronic diseases, warnings about hypersensitivity to drugs, etc., and current medication regimens.



PROCUREMENT ROUND COMPLETED IN SPRING 2008, ALL COUNTY COUNCILS INVOLVED.

PASCAL

Pascal, which will provide comprehensive information on individual drug prescriptions, will replace the National Prescription Database and the national parts of the Patients' Pharmaceutical Information Service.

The objective here is more efficient treatment and improved outcomes through qualitative improvements in drug prescription, greater patient safety through less frequent inappropriate prescribing, and reduced costs for drugs. The aim of the service is to give doctors and other prescribing personnel overall access to all information related to a patient's drug therapy. The service greatly improves the potential for medical follow-up of drug prescriptions. In the long run, it will also enable patients to fully access information on their medication regimens.



BROAD INTRODUCTION IN COUNTY COUNCILS IN 2010.



ACTION AREA SIX

Making information and services easily accessible to citizens and personnel

Citizens will have easy and secure access to health and social care. They will be able to easily access health-related information, communicate in various ways with health and social care, and where needed, remain in continuous contact with their care provider(s). Increasing numbers of simpler services will be performed using ICT and ICT-supported telephone services.

CARE ONLINE

A portal for citizens who want information and help in choosing the right care solution. The service is designed to boost care accessibility, extend better service to patients and the general public, improve public health, enable care to be compared in different parts of the country and contribute to more efficient use of collective care resources. The objective here is the development of a highly useful, accessible and easy-to-use service for citizens and care personnel.

L A PRELIMINARY VERSION SUPPORTING A SMALL NUMBER OF SERVICES TO BE LAUNCHED IN 2009.

CARE ONLINE – PERSONAL SERVICES

A part of Care Online, and originally based on the Stockholm County Council service My Care Contacts, this service will in due course be incorporated into the base platform produced for Care Online. It will enable citizens to reschedule appointments online, apply to renew a prescription, ask questions and get advice. It will also reduce the workload on personnel. More services will be developed and made available on an ongoing basis.

L INTRODUCED AND GRADUALLY EXTENDED, BEGINNING IN 2008.

WEB-BASED YOUTH FAMILY PLANNING CLINIC (UMO.se)

A national clearing house and a development and support service for young people aged 13–25 that provides reliable, easy-to-read information and improve accessibility and advisory services on issues that are sensitive, or felt to be so.

L PRELIMINARY VERSION OF THE WEBSITE WITH A BASIC RANGE OF SERVICES WAS IN PLACE IN THE AUTUMN OF 2008.

THE HANDBOOK – ONLINE INFORMATION, PRIMARILY FOR NURSES

Designed to help improve patient safety and care quality, this service provides scientifically and professionally based information on overall guidelines for care work and descriptions of practical application in different areas and situations.

L AVAILABLE AND UNDER CONTINUED DEVELOPMENT.

1177.se

The 1177.se website (formerly Sjukvårdsrådgivningen.se) provides up-to-date, easy-to-read, fact-checked texts on frequently asked questions by patients and members of the public. The service promotes health and advances knowledge of health and medical care among patients and the general public. It is part of the health services and provides information ahead of, during and after care. It also strengthens the patient's position and involvement. Images and animations are available for children of pre-school and primary school age.

L IN EXISTENCE FOR 10 YEARS. THE SITE HAS HAD A MILLION VISITORS A MONTH IN 2008.

1177 – TELEPHONE ADVISORY SERVICE

This national health helpline (1177) gives citizens round-the-clock access to advice by nurses supported by expert advisory services. The aim of the service is to increase accessibility to care information and guide members of the public to the right care provider.

L REMAINING COUNCILS AFFILIATES DURING 2009.

Progress to date

How quickly will the National Strategy for eHealth be implemented? When will the benefits become apparent? We asked ourselves these questions while preparing last year's status report. The benefits are already becoming apparent. However, the pace of implementation and realisation of the strategy will be determined partly by how successfully the necessary national services are developed and put in place in the various segments of the care sector, and partly by the pace at which the principals and providers are prepared to introduce the various national services. The latter often requires a number of changes in existing ICT systems and operational environments, as well as extensive preparation and training measures.

The already large number of principals and providers is rising as the number of private providers grows. Their capacity to introduce new common technological solutions and ICT services varies enormously, as do their interest and financial capability. This means that the impact of the projects now under way in different areas will not be everywhere apparent at the same time.

The primary benefit experienced by patients and the public once the eHealth strategy is realised will be better access to health and social care and to information on where and how health and social care can be obtained. It has become easier to get in touch with care services thanks to our user-friendly solutions, and patient safety and security have increased accordingly.

Among the challenges we face is the cultural change involved in adapting health and social care more and more explicitly to individual needs. Technology in present day society has advanced so far that many of the services now under development in the health and social care sector are already commonplace in other sectors. It is only reasonable for individuals to expect these services to be available in the health and social care sector as well. The sector must review

the care process from the perspective of the whole patient or user, and adapt its approaches and working methods to that process. If the sector succeeds in meeting individual expectations, this will facilitate and speed up implementation of the ongoing development projects that form part of the eHealth strategy.

Current status

Municipalities and private care providers were for a number of reasons unable to organise and take part as quickly as county councils in ICT collaboration, in accordance with the eHealth strategy. If greater attention is to be given to the needs and interests of municipal and private care providers, it is vital that ongoing discussions on collaboration in the municipal sector and among private providers quickly result in organised cooperation. This is now taking shape; the fact that municipal and private providers have representatives on the management and advisory groups of SALAR's National Centre for Coordination of eHealth is a significant step along the way.

In 2008, the municipalities identified three action areas in the national eHealth strategy as objects of special focus. The municipalities have organised themselves into a national network which will work to ensure that they are closely involved in the development of the strategy and take part of the solutions developed at national level. This will help to facilitate communication and the transfer of information between individual municipal residents and the health and social care services.

A special unit will be established in 2009 with the aim of strengthening and coordinating existing inter-county collaboration between municipalities and between municipalities and county councils on ICT in the health and social care services. The unit will be focusing on the introduction of the national eHealth strategy in municipalities and on eGovernment.

The county councils have implemented the projects forming part of the eHealth strategy to a greater or lesser extent. The table lists a number of projects in terms of their decision status and plans for several national services.

	MANAGEMENT PROJECT								VOLUNTARILY ASSOCIATED	
	Sjunet	Video	HSA	SITHS	1177.se	NEF	SIL	NPÖ	1177	RGS web
Blekinge	Implemented	Implemented	Agreement/introduction	Initiated/Nothing planned	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Implemented	Initiated/Nothing planned
Dalarna	Implemented	Implemented	Implemented	Implemented	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Implemented	Initiated/Nothing planned
Gotland	Implemented	Implemented	Implemented	Initiated/Nothing planned	Implemented	Agreement/introduction	Implemented	Initiated/Nothing planned	Agreement/introduction	Initiated/Nothing planned
Gävleborg	Implemented	Implemented	Implemented	Implemented	Implemented	Implemented	Agreement/introduction	Initiated/Nothing planned	Implemented	Initiated/Nothing planned
Halland	Implemented	Implemented	Implemented	Implemented	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Implemented	Initiated/Nothing planned
Jämtland	Implemented	Implemented	Implemented	Implemented	Implemented	Implemented	Agreement/introduction	Initiated/Nothing planned	Implemented	Initiated/Nothing planned
Jönköping	Implemented	Implemented	Implemented	Implemented	Implemented	Agreement/introduction	Implemented	Initiated/Nothing planned	Initiated/Nothing planned	Initiated/Nothing planned
Kalmar	Implemented	Implemented	Implemented	Implemented	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Agreement/introduction	Initiated/Nothing planned
Kronoberg	Implemented	Implemented	Implemented	Initiated/Nothing planned	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Implemented	Initiated/Nothing planned
Norrbottn	Implemented	Implemented	Initiated/Nothing planned	Initiated/Nothing planned	Implemented	Implemented	Agreement/introduction	Initiated/Nothing planned	Initiated/Nothing planned	Initiated/Nothing planned
Skåne	Implemented	Implemented	Implemented	Implemented	Implemented	Implemented	Implemented	Initiated/Nothing planned	Agreement/introduction	Agreement/introduction
Stockholm	Implemented	Implemented	Implemented	Implemented	Implemented	Agreement/introduction	Implemented	Initiated/Nothing planned	Implemented	Agreement/introduction
Sörmland	Implemented	Implemented	Implemented	Agreement/introduction	Implemented	Implemented	Agreement/introduction	Initiated/Nothing planned	Agreement/introduction	Agreement/introduction
Uppsala	Implemented	Implemented	Implemented	Agreement/introduction	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Implemented	Initiated/Nothing planned
Värmland	Implemented	Implemented	Implemented	Agreement/introduction	Implemented	Implemented	Agreement/introduction	Initiated/Nothing planned	Agreement/introduction	Agreement/introduction
Västerbotten	Implemented	Implemented	Initiated/Nothing planned	Initiated/Nothing planned	Implemented	Implemented	Agreement/introduction	Initiated/Nothing planned	Initiated/Nothing planned	Initiated/Nothing planned
Västernorrland	Implemented	Implemented	Initiated/Nothing planned	Initiated/Nothing planned	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Initiated/Nothing planned	Initiated/Nothing planned
Västmanland	Implemented	Implemented	Implemented	Initiated/Nothing planned	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Agreement/introduction	Initiated/Nothing planned
Västra Götaland	Implemented	Implemented	Implemented	Implemented	Implemented	Implemented	Implemented	Initiated/Nothing planned	Implemented	Initiated/Nothing planned
Örebro	Implemented	Implemented	Implemented	Implemented	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Implemented	Initiated/Nothing planned
Östergötland	Implemented	Implemented	Implemented	Implemented	Implemented	Agreement/introduction	Agreement/introduction	Initiated/Nothing planned	Implemented	Initiated/Nothing planned

Sjunet: The care sector's own digital communication channel.
 Video: Video/distance meeting service via SJUNET
 HSA: the Health Services Address Registry
 SITHS: Secure IT in Health Services
 1177.se: Councils and counties are jointly responsible for 1177.se, a website with information about health care.

NEF: National Format for ePrescriptions
 SIL: the Swedish Drug Information Database
 NPÖ: National Patient Summary
 1177: Nationally coordinated health and advice by telephone
 RGS Web: Decision-making support for health advice over SJUNET

EU collaboration and international cooperation

Active monitoring of developments in the world and meaningful exchanges of experience with other countries are essential if national investment in new ICT support is to be appropriate and cost-effective. Most countries face similar challenges as they introduce their new eHealth services. Through closer international cooperation, states can learn from each other's mistakes and profit from good examples of how best to manage a process of transformation or implementation.

eHealth in the EU

Closer cooperation within the EU in the health and medical care sphere increasingly entails the ability to transfer information efficiently between the national health systems of member states. This not only applies to records of medical care and treatment, but also to data used in research, follow-ups and quality comparisons. The primary purpose of cooperation on eHealth within the EU is to improve patient safety and security during care and treatment in another member state through the digital transfer of necessary information from medical records between care providers.

In recent years, Sweden has played an active role in the eHealth sphere and has been proactive in efforts to intensify and concretise cooperation. Our emphasis has been on moving from strategy to action and the need to show tangible patient benefits. The most notable success in this area was the launching in 2008 of two wide-ranging EU projects in the eHealth sphere,

epSOS and CALLIOPE. Co-financed by member states and the European Commission, the projects involve concrete development work and the creation of a new platform for collaboration.

In 2008, the European Commission took a number of initiatives aimed at raising the level of ambition and moving forward in this area. It submitted three legislative documents that place new focus on eHealth issues. The Commission's primary initiative was a proposal for a patient mobility directive, under which patients would be assured certain rights to medical care in another member state. In the proposal, eHealth was cited as a crucial component in enabling patient mobility within the EU. In addition, the Commission has presented a recommendation on interoperability for electronic health patient records and a communication on telemedicine and telecare. These legislative documents contain a range of proposals and recommendations on how to deal with these issues.

Together, these initiatives indicate a growing need for political commitment to and management of EU cooperation on eHealth. A process involving assessment of the feasibility of creating a new collaborative structure for eHealth at EU level has accordingly been initiated.

Sweden's presidency of the EU in the autumn of 2009

eHealth will be among the issues to be highlighted during Sweden's presidency of the EU in the autumn

of 2009. The Swedish Government will seek to raise awareness of and support for eHealth among EU health ministers and to put eHealth on the EU political agenda. A presidency report on eHealth will show potential care costs if the necessary investment in efficient and effective information supply is not made. The report will also present a model linking ICT projects to overall policy goals for health and medical care and to tangible benefits to patients and health care professionals. A number of meetings and activities will be organised with a view to achieving progress in strengthening political awareness at the highest level of how eHealth can be used to reform and modernise care.

epSOS – Smart Open Services for European Patients

The aim of this project is to take the first concrete steps towards the adoption and implementation of the proposed Patient Mobility Directive, and to make it possible for patients to seek care in other member states. Efforts will focus on establishing a European patient summary which will make key information available in the event of an emergency in another member state, and on enabling e-prescriptions (ePrescriptions) to be sent between member states.

This will be a pioneering undertaking in many ways; it will mark the first time that member states engage in politically approved cooperation to develop specific cross-border care services. The project, which will run between 2008 and 2011 will have a budget of 22 million euro, of which almost half will be financed by the European Commission, making it the biggest EU initiative in the health and medical care field to date. There is every likelihood that the project will have a significant political impact on future EU cooperation.

Sweden will act as project coordinator, a role which will be undertaken in close cooperation with the Ministry of Health and Social Affairs. Sweden plans to test the results of various sub-projects in pilot schemes to be carried out by a number of county councils. The EU project will provide a valuable

opportunity to quality assure and validate national projects, leaving the Swedish health and medical care service well prepared for increasingly close European cooperation in this area. The EU project will also strengthen the already close cooperation between the Government and SALAR in this area and thereby help ensure that our national investment in eHealth services impacts on care activities more quickly and cost-effectively than would otherwise be the case.

Global collaboration for uniform terminology

In 2007, the International Health Terminology Standards Development Organisation (IHTSDO) was established by Sweden and eight other countries to own, manage and further develop the Systematized Nomenclature of Medicine Clinical Terms (SNOMED CT). Several countries have since joined the organisation and negotiations with further countries are currently in progress.

Strategically important issues for IHTSDO include improving documentation on SNOMED CT in order to support quality development, developing common methods and tools, and continuing to deepen cooperation with WHO and other international standards bodies. Sweden is represented on the board of the IHTSDO through the Ministry of Health and Social Affairs and in the body's General Assembly through the National Board of Health and Welfare. Sweden's membership of IHTSDO not only entitles it to access to the international version of SNOMED CT, but also gives Swedish government agencies, organisations and users the opportunity to influence future development.

One of the consequences of the initiative at national level, has been an ongoing, long-term effort to create a national consensus on IHTSDO and establish a national nomenclature for health and social care. A national reference terminology adapted for use in digital information systems combined with a common information structure constitute the basic prerequisites for achieving the objectives of the National Strategy for eHealth.



REGERINGSKANSLIET

Ministry of Health
and Social Affairs, Sweden



Swedish Association
of Local Authorities
and Regions



Socialstyrelsen
THE NATIONAL BOARD OF HEALTH AND WELFARE



Vårdföretagarna