

# Implementing e-health services in Sweden

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# Inera – basic facts

- Inera is a company owned by the 21 county councils and (soon) the 290 local authorities in Sweden
- Inera is providing the owners with services for the patients, citizens and for healthcare staff, along with related infrastructure and architecture
- The company revenue is approximately 75 million euro
- There are about 300 employees at Inera
- We have hundreds of collaborators all over the country – technicians, healthcare staff and decision makers



**Healthcare Guide 1177 by  
phone**

# Healthcare Guide 1177 by phone

450 000  
calls per  
month

50% are  
given  
advice on  
self-care

The other 50%  
are directed to  
the right level  
of care

More than  
90% are  
satisfied  
and follow  
the advice

The screenshot shows the website for 1177 Vårdguiden. At the top left, there is a red header with the text '1177 VÅRDGUIDEN Rådgivningsstödet'. Below this is a navigation menu with buttons for 'Startsida', 'Index', 'Länkar', 'Utbildning', and 'Om webbplatsen'. A search bar is present with the text 'Sök i medicinskt innehåll:' and a 'SÖK' button. The main content area is titled 'Halsont' and includes a paragraph: 'Vägledande vid bedömning av halsont är andra samtidiga symtom, till exempel svältningsbesvär, feber, svullnad eller förkylningssymtom.' Below this, there are three sections: 'Omgående' with three bullet points, 'Skyndsamt' with one bullet point, and 'Avvakta' with one bullet point. A green box highlights a dropdown menu on the right side of the page, titled 'Brädskegrader - definitioner \*', which lists 'Omgående', 'Skyndsamt', 'Närmaste dygnet', 'Vardag närmaste tiden', and 'Avvakta' with their respective definitions.



The general public is welcome to phone Healthcare Guide 1177 twenty-four hours a day, year-round, all over Sweden.

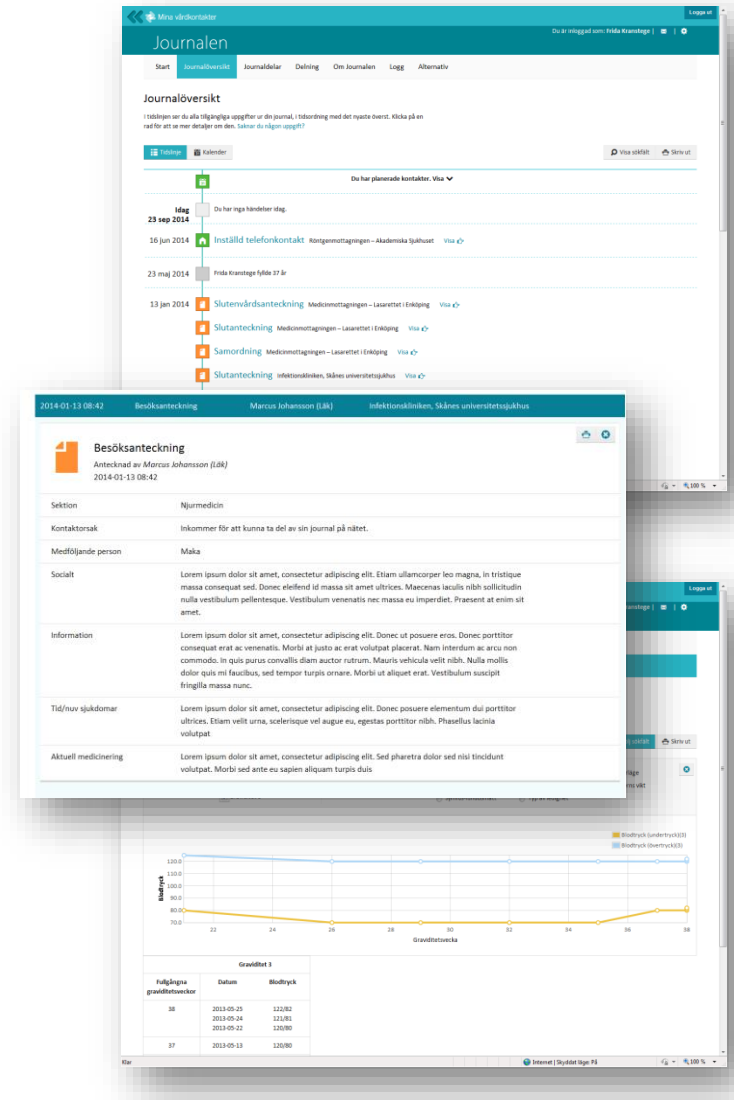
# Healthcare Guide 1177 by phone implementation

- Coherent project organization
- Clear project model and project organization
- Templates
- Manager– project leader
- Nurses in majority
- Train-the-trainer

**Medical records online**

# Medical records online

- 20 counties have made medical records accessible online for patients. The last county has started their implementation
- The service is providing records from clinics and information about immunizations, prenatal care, child care, medication, test results, health care contacts, referrals ...
- 1 million users, and increasing



# Research on implementation shows

- Patients consider the service useful
- They feel better prepared for medical appointments and more informed about their own health
- The service supports them in understanding what the doctor has said and motivates them to go through treatments
- Most patients want more information than is accessible
- Doctors and nurses were initially sceptical, but get increasingly positive when they start to use the service



# Effects of the implementation

- The 21 county councils have agreed on the target that in the year 2020 all citizens in Sweden from the age of 16 shall be able to access their medical records online, and parents shall have access to their childrens records until they turn 13
- An increasing amount of psychiatric clinics are making their records accessible
- Medical staff are beginning to discuss the quality of the medical records
- This service is affecting the relationship between caregivers and patients in a positive way

# **National patient summary**

# National Patient Summary

- The National Patient Summary – the right information in the right place, at the right time and for the right users
- 60,000 accesses during January 2017 from doctors and nurses

The screenshot displays the National Patient Summary interface for patient Karin Henriksson (670820-4578), 81 years old. The interface is organized into several sections:

- Diagnoser >** A table listing diagnoses from 2011-03-19 to 2014-07-19, including Diabetes mellitus typ 1 and Ryggvärk, ospecificerad, with associated clinics like VFL Vårdcentralen Lilleby and Medicinkliniken.
- Ordinerade och förskrivna läkemedel >** A table listing ordered and prescribed medications, including Diabetes mellitus typ 1 and Ryggvärk, ospecificerad, from 2011-03-19 to 2014-07-19.
- Dokument >** A table listing documents from 2011-03-19 to 2010-11-23, including Oppenvårdsanteckning and Övrigt dokument, with Huvuddiagnos.
- Läkemedelsförteckning (uthämtade läkemedel)**: A section indicating that no information is currently available for dispensed medications.
- Klinisk kemi >**: A section indicating that no information is currently available for clinical chemistry.
- Mikrobiologi >**: A table listing microbiology tests from 2011-03-19.
- EKG >**: A table listing EKG tests from 2011-03-19 to 2011-03-19.
- Kontakter >**: A table listing contacts from 2012-08-17 to 2012-01-30.
- Bilddiagnostik >**: A table listing imaging tests, including Önskad undersökning: Lungrönt...
- Övrig undersökning >**: A table listing other tests from 2011-03-19, including Allmän remiss Neurodivisionen..., Klinfys Klinisk fysiologimott KSK..., Allmän Remiss Medicinmott KSK..., and Allmän Remiss Medicinmott KSK...

# National Patient Summery

- The technical connections as a factor affecting the implementation
- Motivation of producing the information
- National regulatory framework
- Legal aspects
  - The Patient Data Act (PDL 2008:355)
- Health professionals

**Scheduling appointments online**

# National personal e-services

- Patients can schedule, reschedule and cancel appointments in health care online
- The clinic has to connect its scheduling system to the national patient portal

The screenshot displays the '1177 VÅRDGUIDEN E-tjänster' patient portal. The top navigation bar includes 'Inställningar' and 'Logga ut' (Inloggad som Sofie Zetterström). The main content area is divided into sections: 'Meddelanden' (Inkorg, Påminnelser), 'Vårdval' (Kvartersakuten Surbrunn), and 'Övriga tjänster' (Journaltjänster, Läkemedelstjänster). A 'Boka tid' (Book appointment) modal window is open, showing the appointment type 'Nyupptäckt knöl' and a calendar for February 2016. The calendar highlights the 24th as the selected date, with a time slot of 14:40-15:00.

**1177 VÅRDGUIDEN E-tjänster** Inställningar Logga ut  
Inloggad som Sofie Zetterström

Meddelanden  
Inkorg  
Påminnelser

Vårdval  
Kvartersakuten Surbrunn

Övriga tjänster  
Journaltjänster  
Läkemedelstjänster

Agera ombud

**Boka tid**  
[Visa fullständig information igen](#)  
Typ av tid: Nyupptäckt knöl

Välj dag och tid  
Den första dagen med lediga tider är förvald. Använd kalendern eller menyn för att välja en annan dag.

onsdag 24 februari 2016

februari 2016

ve.	må	ti	on	to	fr	lö	sö
5	1	2	3	4	5	6	7
6	8	9	10	11	12	13	14
7	15	16	17	18	19	20	21
8	22	23	24	25	26	27	28
9	29						

**VÄLJ TID**  
onsdag 24 februari  
● 14:40-15:00

# An increasing use of the service

**34 854 usages a day**  
- An increase of 50% compared to last year

**2 651 clinics are connected to the service**  
- An expansion of 100% since last year



**An enormous potential**  
- Analysis show an expected economical saving of 700 euros a year when the service is in full use

# Effects of implementing the service

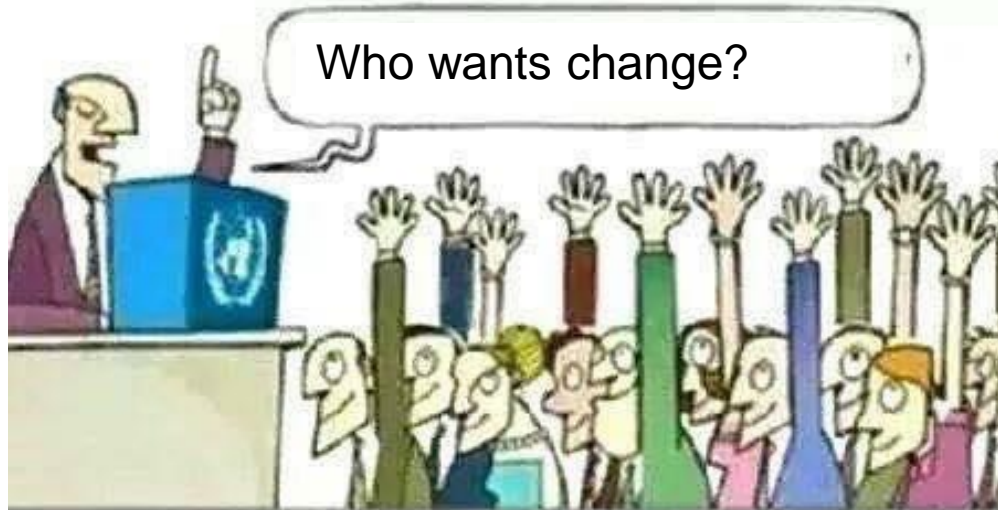
- An initial resistance from some of the health care staff
- A decreasing amount of late cancellations
- Less patients that never show up
- Less phone calls
- Less administrative tasks for the nurses
- Better service for the patients as the service is in use around the clock



**Conclusions**

# What have we learned?

- Technology is no obstacle
- The challenge is about changing working methods and business development
- A success factor is local involvement driven by enthusiasts
- Management has to be involved
- Change takes time



**Thank you for your time**