

FIRE AND BLOOD

GÖTEBORG'S HISTORY OF MEDICINE THROUGH 400 YEARS
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HEALERS, PEDDLERS AND ORDINARY PEOPLE

People have always suffered from diseases and accidents. How healthcare works and how illnesses and injuries are treated depends on availability of knowledge and how society functions. Well into the 18th century, there is no healthcare comparable to that of today. It is often only those who live in cities who can receive treatment from a doctor or someone with medical training.

In the countryside, people are left to fend for themselves. In the cities it is often barber surgeons or those with practical training who take care of accidents, injuries, and illnesses. Others who practice medicine have no training at all. From the end of the 18th century, the state takes on greater responsibility for organizing healthcare, more doctors are trained, and new hospitals are founded.

WISE MEN AND WOMEN

Until the end of the 18th century, there is no organized healthcare. Most people live in rural areas where there is no access to a doctor until a bit into the 20th century.

Instead, people make use of the knowledge they themselves have. This can be home remedies, delivering babies, splinting broken bones, or pulling joints into the right position.

It may be the blacksmith who pulls out bad teeth with his tools. Others may perform bloodletting, mix medicines, or perform rites and rituals to drive out disease.

It is common for the men and women who perform treatments and rites to be called "wise". Wise men and women are a natural part of the old farming society when there is no doctor, home remedies have no effect, and the priest cannot help. In many cases, the diseases just run their course.

BRITTA LENA ANDERSSON

Britta Lena Andersson (1824–1904) or "Kungsbackagumman" is a famous wise woman who treats all kinds of diseases and ailments. Born in Vallby, Fjärås she learns basic knowledge of medicine and herbs from her maternal uncle. From an early age she helps in accidents and with sickness. She is a skilled joint puller and can splint (fix) broken bones. Her reputation grows and she receives patients in her home in Hambrö gård in Kungsbacka. For a while she also treats patients in a house on Haga Östergata in Gothenburg. The treatments are often made with ointments and poultices. Britta Lena Andersson's ointments are sold in pharmacies in Gothenburg long after her death. On the same day that she dies, October 23, 1904, Sweden's strongest earthquake in modern times, occurs. It quickly becomes part of the myth surrounding her.

HUMORAL PATHOLOGY

Many ideas about how the body works, how diseases arise and are cured can be traced back to ancient Greece and ancient Egypt. The idea that illness and health are dependent on four fluids in the body is called humoral pathology and it is believed that by emptying out blood, mucus and black and yellow bile, the diseases can be cured. In the second half of the 19th century bacteriology and cell pathology influence understanding of the body, disease, and treatment. Throughout the long period that humoral pathology is the explanation for disease, there are many other theories about how the body works and why diseases break out and are cured. One of the most common is that gods, magic or evil forces affect sickness, health, suffering and death.

TREPANATION, AMPUTATION AND TOOTH EXTRACTION

Trepanation, drilling or scraping a hole in the skull bone was performed as far back as the Stone Age. Trepanation is done to contact the spirit world, drive out evil spirits but also to treat skull injuries. Pain has long been a part of surgery. Everything from pulling teeth to amputating a body part involves pain. Using herbal drugs such as opium and mandrake, sometimes mixed with other substances such as alcohol is risky and the active substance difficult to control. So, until the discovery of anaesthesia in the mid-1800s, operations and amputations are often performed without any pain relief. Before bacteria and antiseptics are discovered, there is great risk of fatal infections and other serious complications.

INFECTION

Theories about the spread of infection have been described since ancient times. From the 17th century onwards infection that spreads through the air is called "miasma". Miasma is connected to processes of decay, climate and weather which are believed to create and spread infections. Rooms are aired to let out the badness or purified by smoke from burning various substances. In addition to infection through miasma, sickness is thought to be spread through physical contact with the sick person or the sick person's clothing. Which route of transmission is the greatest cause for spread of disease sometimes results in lively debate.

BARBER SURGEONS, CUPPERS AND BATHING

Several thousand years ago there are already operations to remove urinary stones and treat hernias and cataracts. Stone removal and cataract operations are performed in ancient Egypt, India and Mesopotamia. Texts from the period describe agents to stop bleeding and methods that involve cauterizing or burning. Tying off one or more larger blood vessels in connection with their cutting (ligatures) is described in writings from the Roman Empire, but the method is forgotten, and it takes until the 16th century before it starts to be used again.

In the cities, there are professional groups that perform minor surgical procedures, dress wounds, take care of accidents, perform cupping and bloodletting. The professions are known as barber surgeon and cupper and in addition to medical care, offer beard and haircuts or a visit to a bathhouse. Who has the right to do what is often determined by the city.

GOTHENBURG'S OLDEST HEALTHCARE FACILITIES

Gothenburg's infirmary is part of the city's welfare provision for a long while. In addition to the hospital, there is an orphanage, a poorhouse and a sanatorium for contagious venereal diseases. In 1799, Gothenburg's Board for the Welfare of the Poor is founded and additional poor and welfare institutions open. In 1806 the merchant Johan Peter Holterman finances a poorhouse which becomes known as the Holtermanska barracks, or just "Bracka". For a long time this term is used for all poorhouses in Gothenburg. During the 1700 and 1800s many private healthcare institutions are founded with the help of gifts and donations. Sahlgrenska hospital opens in 1782 with a donation from Niclas Sahlgren's will, and Gothenburg's children's hospital opens in 1859 with a donation from David Carnegie. At the end of the 1800s the city takes over many of these private institutions and opens several outpatient clinics. It is some time into the 20th century before public health care can meet the needs of everyone who seeks help. Private care remains an important part of the care available.

GOTHENBURG'S FIRST HOSPITAL

The oldest trace of a hospital in Gothenburg is a bill for the delivery of stone for the hospital's well in 1665. The hospital is probably a so-called cure house for patients with contagious venereal diseases, especially syphilis which is a big problem during the 1700 and 1800s. The hospital is demolished in 1723 and a new cure house at today's Kaserntorget is completed in 1728. The new hospital is sometimes called the "hospital under the oak forest". During the 1800s the hospital is located at Lilla Bommen. In 1894 it is replaced by the new Holtermanska hospital in Landala. When antibiotics are available to cure most venereal diseases the need for a specialist hospital is less, and this care moves to Sahlgrenska hospital in 1960.

THE INFIRMARY

Infirmarys are the oldest type of healthcare facilities in Sweden. They are built in the 13th century and run by the church for people suffering from leprosy. When the disease becomes less common in the 16th century, the infirmary becomes a place for people who cannot take care of themselves. There are the old, the disabled and the sick, there are also people with mental illnesses. In the 16th century, the state takes over responsibility and from the 19th century onwards, they are only for people with mental illnesses. In 1528, the infirmary in Lödöse is moved to the new town Nya Lödöse, which is built where the Gamlestan district is located today. The hospital moves to Backa in 1872. In 1931 the facility is renamed St. Jörgen's Hospital, it closes in 1992.

SYPHILIS

During the 16th century, syphilis spreads to Europe from South America with European sailors. The disease has several stages and many different symptoms that can appear many years after the time of infection. Untreated syphilis can also affect the brain and cause mental illness. For a long time the disease is difficult to diagnose and there is no effective treatment. In 1905, the syphilis bacterium is discovered and the first working drug, Salvarsan, is developed a few years later.

CLAS ALSTRÖMER'S ILLNESS, TREATMENT AND DEATH

Clas Alströmer (1736–1794) is the son of merchant and industrialist Jonas Alströmer and married to Sara Catharina, daughter of East India Company director Niclas Sahlgren. After Niclas Sahlgren's death, it is Alströmer who takes care of Sahlgren's will, which leads to the founding of the Sahlgrenska hospital. When Alströmer is in his thirties, he suffers from a paralyzing disease that he spends twenty years trying to cure with a variety of painful treatments. The memorial speech for Alströmer describe the treatments he goes through and provide an insight into the 18th century way of thinking.

"...a no less painful and even more irritating method was used than the electric shocks; for night and morning he had the body rubbed and whipped with nettles."

From memorial speech for Alströmer 1794

THE DOCTOR AND MEDICAL TRAINING

At the end of the 18th century, medical training improves and the number of trained doctors increases. Until the 19th century, there are only a small number of trained doctors in Sweden, most of them in the cities. Until the middle of the 19th century, medical training contains a mixture of ancient texts and 18th century theories of medicine and botany. Iatromechanics (a theory in which the body is likened to a living machine) is important together with theories that diseases arise because the body is over or under stimulated or "irritated" by its surroundings. Common treatments are bloodletting, cupping, emetics, Spanish flies and wet wraps. Most treatments are the same as in ancient humoral pathology and the vast majority have no medical effect. During the second half of the 19th century views on sickness and infection change. With new knowledge comes new instruments for listening to, looking at and measuring the body's signals. Now doctors start to wear white coats.

ANATOMICAL DISCOVERIES

For over a thousand years, the Greek physician Galeno's many books on the human body and the body's diseases are the basis for doctors' training. When Andreas Vesalius publishes "De humani corporis fabrica" in 1543, the image of human anatomy changes. He points out many errors in the ancient scriptures. The errors probably arose since ancient authors dissected monkeys and other animals instead of humans. "De humani corporis fabrica" becomes widespread and becomes a symbol of the trained physician.

APOTEKET

The first pharmacy in Gothenburg is the Unicorn pharmacy, which opens in 1642. Many Swedish pharmacies have animal names, sometimes with a clear symbolic meaning. Lions and bears symbolize strength, ravens and owls wisdom and the unicorn a healing ability. Signs showing the name of the pharmacy with a picture or carved figure mean that even people who cannot read can find the pharmacy.



FIRE AND BLOOD

Until the middle of the 19th century, operations and other surgery always involve pain. Open wounds, exposed fractures and amputations risk leading to fatal infections. Bleeding, pain and infections have long been obstacles to surgery. When ether and chloroform are discovered in the 1840s, pain is no longer a natural part of surgery. But anaesthesia does not solve the problem of infections. It is only when knowledge about bacteria and how they cause infections increases, that antiseptic methods are developed. When X-rays are discovered in 1895, it is possible to see inside the body without having to open it up. X-rays are soon used in many different areas: to make a diagnosis before surgery and as radiotherapy.

THE NURSE

The breakthrough of antiseptics and anaesthesia change what is possible with surgery and creates a need for trained operating room nurses. More nurses with knowledge in hygiene and the spread of infection are also needed. Developments in healthcare and the growing population increase both the number of patients in hospitals and the need for nurses.

NURSE TRAINING

The first nursing school in Gothenburg is run by the Red Cross. The school is founded in Uppsala and is Sweden's first nursing education without a religious basis. The Red Cross runs training at the Sahlgrenska Hospital from 1877 to 1882. After that, Sahlgrenska Hospital runs training under its own auspices. At the end of the 19th century, the training is six months long. It is for the most part practical and the students are used as labor. The working day is long and consists of floor cleaning, bed 'making, wound dressings and distribution of food and medicines. There is no theoretical education, but students are expected to read certain literature when there is time, including translations of Florence Nightingale's "Notes on Nursing". In 1899, the

training moves to the new Sahlgrenska Hospital. It is improved and extended to one year. In 1912, the education lasts two years and is considered one of the best in the country. Until the 1930s, a nurse stops working when she gets married. In the 40s, married nurses begin to be accepted.

EMMA KLINGBERG

Emma Klingberg (1840–1919) is the head nurse at the surgical clinic at Sahlgrenska Hospital from 1871. She is a Red Cross nurse and a student of Emmy Rappe who was trained at Florence Nightingale nursing school at St. Thomas hospital in London. From 1877 she ran the training in Gothenburg, first under the auspices of the Red Cross and then under the auspices of the Sahlgrenska hospital. Emma Klingberg continued to work as director of nursing education until her retirement in 1898.

"She was around 65 at the time, had distinct leadership qualities, an unlimited ability to work and a brilliant sense of humour"

Barthold Carlson, doctor at Sahlgrenska hospital 1896–1899 about Emma Klingberg

THE MIDWIFE

Until the end of the 19th century, there are great risks in giving birth, both during and after childbirth. During the 19th century, childbed fever causes death and illness. The infections are most common in hospitals and maternity hospitals, where they are spread when several women are examined one after the other, often in connection with the training of midwives and doctors. Towards the end of the 19th century, the risks are reduced with antiseptics and better hygienic conditions. During the same period, the number of trained midwives increases, and more women choose to give birth in hospitals and maternity hospitals. The midwives also give advice on breastfeeding, childcare, hygiene, and the spread of infection. In rural areas, the midwife is often the only person with a basic education in healthcare.

MIDWIFE TRAINING

Training of midwives at Sahlgrenska hospital starts in 1856. Midwives for the whole of western Sweden are trained here. Some of the places are free of charge if the student undertakes to work in her home parish. The nine-month training is divided into two semesters, one theoretical and one practical. The theoretical part includes, anatomy, childbirth and hygiene. The practical part includes various birthing techniques, the art of stopping bleeding, administering enemas, emptying the bladder with a catheter, and more. A midwife must also be able to apply leeches, carry out cupping, bloodletting, and vaccinate. The students are used as labour throughout the training period and perform a large part of the work at the maternity hospital. The students are between 20 and 35 years old. Both unmarried and married women are accepted. Those who train to become midwives at the end of the 19th century come from the working class, as distinct from nurse training where students also come from the middle and upper classes. With the midwifery training, the state increases its control over births and over what advice is given regarding the health of children and mothers. The goal is to reduce illness and death in connection with pregnancy and childbirth.

SOCIAL STATUS

At the beginning of the 19th century, it was considered that only women who had children themselves could work with childbirth. When young and unmarried women begin to train as midwives views have not changed. The sexual morality of the 19th century, and that midwifery students mostly come from lower social classes, means that the profession of midwifery is not seen as fine a profession for women as nursing or teaching. The Association of Midwives runs early campaigns to improve the profession's social status together with demands for a longer training period, the right to a pension and for its own trade journal.

JOHANNA HEDÉN

Johanna Hedén (1837–1912) is the director of Gothenburg's midwifery institution between the years 1867–1877. She trains as a midwife at Stockholm's midwifery school and takes the barber-surgeon exam as Sweden's first female barber-surgeon. The surgical training is necessary because in her employment as a midwife in Kall's parish and at the Gustafs and Carlberg copper works in Huså, she is also responsible for vaccinations, manages the medical supply, and responds to mining accidents as the only medical expert in the area. In 1885, she founds the country's first midwifery association, the Gothenburg Midwifery Society. As president of the society, she calls a national meeting in 1886, where the foundations of the Swedish Midwives' Association are laid. She also starts an insurance and funeral fund for the midwives in Gothenburg and is instrumental in founding the midwives' trade journal "Jordemodern". She writes in "Jordemodern" throughout her life. Her series "Stork letter" contains both practical advice and experiences. In her texts, she makes visible what midwives are up against at the end of the 19th century, both in terms of norms, morality and the status of the profession.

"If I had instead been a teacher at a primary school, worked in a nursery or in an asylum for the insane, then I wouldn't have been ostracized like a scabby sheep."

Johanna Hedén, published in Jordemodern at the end of the 19th century.

MEDICAL TRAINING IN OBSTETRICS

At the beginning of the 19th century, study of obstetrics is a compulsory part of medical training. Practice at maternity hospitals is one of the longest that the trainee doctor undertakes. The goal is to be able to handle every type of complicated birth. Compared to the midwife the training period is shorter but more effective. Access to patients is prioritized for the doctors and with no other duties they can focus on learning and literature, which is more extensive than the midwife's textbook. At the start of the 20th century, training in obstetrics can be combined with training in paediatrics. Doctors specialise in obstetric complications, whilst midwives focus on normal births.

MEDICAL BREAKTHROUGHS 1805–1945

1805 – Friedrich Sertürner discovers morphine.

1846 – Ignaz Semmelweis sees the connection between lack of hygiene and childbirth mortality and introduces hand washing and disinfection in his clinics with clear results.

1846 – Ether is introduced as an anaesthetic during surgery.

1847 – Chloroform is introduced as an anaesthetic during surgery.

1858 – Rudolf Virchow's work on cell pathology is published. It changes the way disease is studied and diagnosed in the body's cells, tissues and organs.

1865 – Joseph Lister develops antiseptic surgery and wound disinfection.

1878 – Louis Pasteur presents research results that become the basis of bacteriology.

1882 – Robert Koch discovers the tubercle bacterium and can prove how specific bacteria cause various diseases.

1884 – Ophthalmologist Karl Koller discovers cocaine's local anaesthetic effects.

1895 – Wilhelm Conrad Röntgen discovers röntgen rays, known as X-rays.

1901 – Karl Landsteiner develops the ABO blood group system. The fact that blood can be grouped increases the chances of successful blood transfusions.

1904 – Ferdinand Sauerbruch develops a vacuum chamber that makes it possible to operate inside the chest.

1913 – Electrocardiography (ECG) is used for the first time.

1928 – Alexander Fleming discovers that the mould *Penicillium notatum* inhibits bacterial growth. The discovery leads to the development of penicillin.

1933 – Sulfa (sulfonamide - antimicrobial) is discovered. Childbed fever and blood poisoning are no longer incurable. Many infections that occur after operations can now be treated.

1945 – The method for purifying and producing effective penicillin is developed by Ernst Chain and Howard Florey.

GOTHENBURG 1823–1927

1823 – Sahlgrenska hospital moves to Östra Hamngatan.

1855 – Sahlgrenska hospital moves to Grönsakstorget.

1859 – Gothenburg's first childrens' hospital opens on Östra Hamngatan.

1862 – Majorna's hospital opens.

1866 – Gothenburg's childrens' hospital moves to Haga.

1875 – Gothenburg's maternity hospital opens on Sprängkullsgatan.

1877 – The Red Cross runs nurse training at Sahlgrenska hospital.

1882 – Sahlgrenska hospital starts their own nurse training.

1899 – Sahlgrenska hospital opens at Änggården.

1899 – Ivar Bagge opens an X-ray institute.

1900 – Emil Strandman's surgical clinic opens in the same building as Ivar Bagge's X-ray institute. The building is known as "Fire and Blood".

1900 – Gothenburg's maternity hospital opens on Övre Husargatan.

1903 – Barthold Carlson opens a private surgical clinic.

1909 – Gothenburg's childrens' hospital moves to Änggården.

1910 – Ekmanska hospital opens in Örgryte.

1912 – A nursing home opens in Änggården.

1924 – Mölndal's hospital opens

1927 – Carlanderska hospital opens in Johanneberg.



DIRT, FILTH AND DISEASE

During the 19th century, mortality in Sweden changes. Death from infectious diseases is decreasing. More and better food makes the population healthier. The new smallpox vaccine stops recurring epidemics of the disease. More children survive which leads to a sharp increase in the population. Other changes are slower. During the 1800s Sweden is hit by several cholera epidemics. Until the middle of the 20th century, tuberculosis is a major problem with tens of thousands dying every year. During 1918-19, 35,000 Swedes die of the Spanish flu. Epidemics of polio, typhus, scarlet fever and other infectious diseases affect Gothenburg every year. Diseases and poor living conditions lead to society taking on greater responsibility. The harsh life in the cities is the focus of large social movements working to reduce problems with health, work environment and rights linked to class and gender. The social movements make way for the democratic breakthrough of the 20th century.

TUBERCULOSIS

In the early 20th century, tuberculosis causes around 10,000 deaths in Sweden each year. The poor, the sick and the overcrowded are hit hardest, but all social groups of all ages are at risk of becoming ill. At the end of the 19th and into the 20th century, as housing is improving, overcrowding is decreasing and good food and clean water are accessible, the trend in sickness decreases.

At the beginning of the 20th century, major social efforts are made to inform about, prevent and treat the disease. At the same time, the possibilities to diagnose and track infection are increasing. During the 1920s, a vaccine is developed and during the 1940s, antibiotics are discovered that can cure the disease. Until the discovery of effective cures, tuberculosis means long hospital stays and the disease is often a protracted death sentence. Before the tuberculosis bacterium is discovered, there are many explanations for how the disease spreads. Common explanations are that it is hereditary or that it is spread via food, drink, clothing or air. It is commonly thought that the disease is a punishment or trial from God and that it is pointless to try to protect oneself or to seek treatment.

*Tonight I shall die.
There flickers a flame.
A friend by my side is holding my hand.*

*Tonight I shall die.
But who knows the name
of where I am going – unto what land?*

From Harriet Löwenhjelm's (1887–1918) poem *"Take me. Hold me."* Tr. Anne-Charlotte Hanes Harvey The poem is written sometime during her final days. After being diagnosed with pulmonary tuberculosis in 1913, she is periodically a patient at Romanäs sanatorium, where she dies on the night of May 24, 1918.

BLUE HENRY

The beautiful clear blue glass bottle carries a dark story. It is used to collect the bacteria filled sputum of the tuberculosis patient. The purpose is to reduce the spread of infection. It is easy to spit into, with a funnel hidden under the lid, and easy to empty and clean. The blue glass is transparent enough to see when it needs to be emptied, without showing any details. Sales of the bottle begin in 1889, the same year that the tubercle bacterium is discovered. The price is low making it affordable for more people. Thomas Mann's novel *"The Magic Mountain"*, set in a sanatorium features the bottle naming it *"Der Blaue Heinrich"*, Blue Henry.

THE DISPENSARY

At the Dispensary, tuberculosis is tracked down. When a person is diagnosed, nurses from the dispensary are sent to the home. The whole family is offered an examination in hospital, the nurses give advice and help to improve the home, children are sent to schools and nursing homes. If the family is poor, there is help available with furniture, food, firewood or even other housing. The dispensary remains at the same location until 1974.

"In those days, when you found out you had tuberculosis, it was a very big problem, especially for mothers. They didn't know what to do with their children. Back then, there was often nothing but orphanages for them. They were poor at that time and then they came to the dispensary. We still have cards where it is written that they received five kroner a month for milk, extra milk for themselves. So that they could drink now and then. Because they couldn't afford it otherwise. Or they could get five kroner to help with the laundry, for someone to come and do the washing. Five kroner for a pair of shoes for one of the children."

Solveig Trädgårdh nurse at the Dispensary

THE SANATORIUM

Before the sanatoriums, there are few places for tuberculosis patients. The first nursing home for people suffering from tuberculosis in Sweden is Harald's memorial in Gothenburg 1883. More and larger sanatoriums open around 1900. Some of the early sanatoriums are private, others are paid for by Oscar II's jubilee fund. They are called the jubilee sanatoriums and are for those who cannot afford to pay for care. On the island of Styrösö summer housing for children with tuberculosis is founded, starting in 1893 with a smaller wooden building. In 1908 a larger stone building is added, the hospital is named Styrösö Coastal Hospital.

In 1906, a proposal is made to build a separate pavilion for patients with tuberculosis at the Sahlgrenska hospital. Building starts in 1908 and patients are accepted as early as March 1910.

The Renström sanatorium, planned by the city council in 1903, was completed in 1913. Many other smaller sanatoriums, hospitals and tuberculosis facilities open around the turn of the century.

THE FIRST FEMALE DOCTORS

At the start of the 20th century public health improves. Trust in doctors and science is great. Doctors become trusted persons with influence, both as experts and politicians. At the turn of the century, more and more women take medical degrees after being allowed to train for the profession in 1870. The first generation of female doctors work mostly as gynaecologists, many are politically engaged and work for women's suffrage and other reforms.

THORA WIGARDH

Thora Wigardh (1860–1933) is born in Gothenburg ten years before women are allowed to train as doctors. She decides on her profession early on. After taking her medical degree and specializing in gynecology in Uppsala and Stockholm, she moves back to Gothenburg as the city's first female doctor. She is involved in political issues and is active as a board member in the Association for Women's Political Suffrage. She is one of several famous Gothenburg women who pave the way for women's suffrage. Thora Wigardh is known throughout the country as a lecturer on hygienic and social topics. As a member of the Swedish Association for Protection of Mothers and Sexual Reform, she works for the protection of unwed mothers and their children, a healthier view of sexual matters and state maternity insurance.

FOLKHEMMET AND WELFARE SOCIETY

Under 1800-talet flyttar allt fler till städerna för att arbeta. Trångboddhet och fattigdom ökar. I början av 1900-talet är Sverige ett fattigt land med överbefolkade städer. Tuberkulos är vanligt.

När fler människor jobbar i industrierna ökar olyckorna på de många gånger farliga arbetsplatserna. Sjukdomar, olyckor och ett utbrett fylleri på grund av billigt brännvin förstör familjer och deras ekonomi. Sjukdomar, osäkra arbetsförhållanden och frånvaron av sociala skyddsnät leder till att flera folkrörelser grundas. Folkrörelserna lägger grunden för rösträtt och demokrati under tidigt 1900-tal. Under 30-talet inleds en period av ekonomisk uppgång i Sverige som fortsätter under 40-, 50- och 60-talen. Nu pågår det samhällsbygge som brukar kallas "folkhemmet" och som förknippas med en upprustning av välfärdssystemen. Sverige går från att vara ett fattigt land, till att bli ett rikt land.

FOLKHEMMET AND WELFARE SOCIETY

During the 19th century, more and more people move to the cities to work. Overcrowding and poverty are on the rise. At the beginning of the 20th century, Sweden is a poor country with overpopulated cities. Tuberculosis is common. When more people work in industries, the number of accidents increases in the often dangerous workplaces. Diseases, accidents and widespread drunkenness due to cheap alcohol destroys families and their finances. Diseases, unsafe working conditions and the absence of social safety nets lead to the founding of several social movements. The social movements lay the foundation for voting rights and democracy in the early 20th century. During the 1930s, a period of economic growth begins which continues during the 1940s, 50s and 60s. This is a time of societal change. Known as "folkhemmet", or the peoples' home it is associated with an upgrade of the welfare system.

SANITARY IMPROVEMENTS

At the beginning of the 19th century, the Swedish cities are small and dirty. Garbage is thrown into gutters and waterways. Heaps of manure from horses, pigs and cows are piled up by the houses. Outhouses are built over waste pits which are not emptied. Mortality in the cities is several times higher than in the countryside. During the second half of the 19th century, sanitation improves. Water and sewage systems are built, the handling of latrines and waste is improved, foodstuffs are checked, and market halls are built. The 1874

Health Care Act is a reaction to the cholera epidemics and the health problems caused by industrialization. All cities must have a Health Care Authority that is responsible for sanitation.

FEVER AND DIARRHEA

Alongside epidemics are the ever-present diseases. Fevers and diarrheal diseases are common. Bloody flux (dysentery) causes high mortality and great suffering among the population. The name comes from the bloody diarrhea that is one of the symptoms of the disease. Diarrhea and fever diseases hit children and the elderly the hardest. The healthy and well-nourished have a better chance of coping. By the early 20th century, with access to better food, clean water and more efficient waste management mortality due to these diseases decreases.

KÄNSÖ QUARANTINE STATION

With major outbreaks of plague, yellow fever or cholera, isolation and special quarantine stations are used to stop epidemics. Känsö quarantine station, in the Gotheburg archipelago, is one of the places where ships are quarantined. In addition to the storehouses, a hospital and housing, the "Parlor" is part of the facility. It is a building where people in quarantine can receive visitors. The building is divided by an iron grate and a floor drain where burning acids create fumes that are meant to disinfect and protect the healthy from the sick. The quarantine station is in use until 1934.

Until the end of the 19th century there is a theory that disease spreads through bad air, known as "miasma". It is also thought that infection spreads by physical contact with the sick. Sometimes the infectious agent is called "contagium" and is described as an invisible poison.

CHOLERA OUTBREAK

1834 Sweden's first cholera epidemic breaks out in Gothenburg at the end of July 1834. 1,709 of the city's 21,000 inhabitants die. Cholera causes vomiting and severe diarrhea which quickly leads to dehydration and death without proper treatment. Many patients are treated at Sahlgrenska hospital on Östra Hamngatan. The hospital is soon overcrowded, until special cholera hospitals open. Of the 168 patients treated at Sahlgrenska hospital 110 die. 12 000 people die in Sweden. The last epidemic strikes the country in 1866, whilst in Europe there are epidemics into the 1890s.

SAHLGRENSKA HOSPITAL 1848

"On the upper floor, 10 hospital rooms are found. Three towards Hamngatan or east and seven towards Spannmålgatan to the north... outside the sick rooms was a wide and spacious corridor, facing south, which in times of great sickness, such as during the cholera epidemic in 1834, was also used as an infirmary".

Commemoration at the celebration of Sahlgrenska hospital's centenary on 31 March 1882.

SMALLPOX

Until the late 1800s, smallpox is common. Those who survive the disease are immune for the rest of their lives, but over a long period of time a large number of people die from the disease. During the 18th century, a method is introduced in Europe where healthy people are infected with pus from smallpox blisters. Inducing a mild disease to become immune is called variolization. At the end of the 18th century, a method is discovered with the milder disease cowpox that also provides protection against smallpox. The method is called vaccination, the name comes from "vacca" which means cow in Latin. In Sweden, vaccination against

smallpox begins in 1801. From 1816, it is compulsory to vaccinate children under the age of two. Throughout the 19th century, several serious and contagious diseases spread. Large parts of the population suffer from viral diseases such as smallpox, measles and rubella, or from bacterial diseases such as typhus, diphtheria and scarlet fever. Increased knowledge about bacteria and viruses at the end of the 19th century leads to the development of several vaccines and other treatments such as serum treatments.

1721 – Variolization is introduced in Europe. The method is known in India and China since the 11th century.

1770s – The discovery that cowpox protects against smallpox is made in England.

1798 – Edward Jenner publishes his first article on smallpox vaccination.

1801 – The first smallpox vaccination is carried out in Sweden.

1816 – Smallpox vaccination of children under 2 years of age becomes mandatory.

1824 – Gothenburg's clinic for child vaccinations opens.

1894 – Serum against diphtheria is developed by Emil Adolf von Behring.

1921– Vaccine against tuberculosis is developed by Albert Calmette and Camille Guérin.

1940s – Tuberculosis, diphtheria and tetanus are included in the general vaccination programme.

1950s – Childhood vaccination against whooping cough.

1957 – Childhood vaccination against polio.

1971 – Childhood vaccination against measles.

1974 – Childhood vaccination against rubella.

EPIDEMIC DISEASES HOSPITAL 1886–1970

When the Epidemic Diseases Hospital opens in 1886, it is Sweden's first modern epidemic hospital. The hospital opens after the epidemic statute stipulates that every town must have a hospital to be able to isolate people with contagious diseases. Treatment moves to Östra hospital in 1970.

THE DISTRICT NURSE

During the 1920s, the number of district nurses increases. They collect information about the health situation in the countryside and report to the provincial doctor. They provide healthcare and give advice on health and hygiene. The area they are responsible for is often large, sparsely populated and poor. As with the provincial doctor and the district midwives, the district nurse is often alone, both as a medically trained person and at work. The professional role in the district is completely different from in the city.

"But it wasn't the wealthy farmer's wives who had the children, it was the poor peasants. No income from the patients could be counted on. Rather, they needed help from me. The training or the experience I got during my service in Gothenburg, it was invaluable. And it has always, during my whole life since, been firmly anchored in my memory the difference between what training and experience means before you are out there on your own with sole responsibility."

Hanna Bernin, district midwife 1924



A NEW ERA

During the 1930s, a major expansion of the Sahlgrenska hospital begins. The project runs between 1936 and 1959 ending with the inauguration of the Central Complex. The change is so great that there is talk of a completely new hospital: The fifth Sahlgrenska. Healthcare is being improved and modernized. Disposable products and automation are replacing work that was previously done by hand. At the same time, the Second World War is being fought. Both the hospital and the community are changing. Sahlgrenska becomes a university hospital, new medicines and treatments bring change. As healthcare and welfare are expanding new materials, technology, methods, norms and ideals give rise to a new society.

"With some regret, we left our old department and moved into new, fresh and modern premises. There was a dishwasher in the kitchen, an autoclave for sterilizing instruments, a flushing device for disinfecting the bedpans and stainless storage vessels in the wall to collect urine. In each ward there was oxygen and an oxygen outlet in the wall. All this and more was new to us".

Ulla Sterning, nurse at Sahlgrenska hospital 1948–1994.

THE FIFTH SAHLGRENSKA

The Gothenburg Hospital Directorate is formed in 1933 to manage all of Gothenburg's hospital facilities. They lead the construction of the so-called "fifth Sahlgrenska". A name created by hospital director Hugo Höglund to link the large new construction to the hospital's history. The development is documented in photos, films and sound recordings. The material is used to describe what is new at the hospital site and highlight Gothenburg's healthcare history.

1933 The Gothenburg City Hospital Directorate is established.

1936 Nurses and student nurse housing

1937 Heating and power station

1937 The surgery building

1938 Eye and ear clinics
1938 Psychiatry Clinic
1939 The Womens' Clinic
1940 Central Laboratory
1940 Nurses home
1943 Gustaf V's Jubilee Clinic
1946 Midwives and midwifery student housing
1949 Sahlgrenska hospital's museum
1949 University of Medicine in Gothenburg
1953 Kitchen and dining building
1953 Pathological-anatomical department
1953 Rheumatology Clinic
1959 Central Complex

NURSES HOME

At the beginning of the 20th century, the nursing students live in the hospital and perform much of the daily work. The working days are long and there is a strict hierarchy between professional groups. The lack of housing is a problem. During the 1930s and 40s, a student dormitory and a residential building for nurses are built. Housing for nurses, midwives and students is included when building new clinics. When treatment and diagnostics develop during the 1930s, higher demands are placed on the nurses. Their role becomes more that of assisting the doctor. At the same time, the number of nursing assistants, assistant nurses and students at the hospital is increasing. The first courses for assistant nurses start in the 1940s and are offered at high school level from the 1970s. During the 1960s, staff and student housing and compulsory uniform disappear. Student nurses can no longer be used as a workforce and more personel are hired. From 1951, men are allowed to train as nurses. More X-ray, radiotherapy and laboratory assistants are being trained.

EYE AND EAR CLINICS

The new building for the eye and ear clinics is finished in 1938. At the eye clinic cataract operations, and treatment of injuries and infection is carried out. The developement of antibiotics in the 40s brings new possibilities, reducing the number of acute infections. The number of tonsillectomies reduces as does the need to drain fluids from ear infections.

During the 50s, new premises are needed for teaching and research when Sahlgrenska becomes a university hospital. A building extension combines the nurses' residence with the clinic. In the coming decades, staff housing is phased out. The distance between the old way of conducting healthcare and the new grows increasingly.

THE NEW SURGERY BUILDING

The development of the surgical clinics reflects the rapid changes of the times. When the new surgery building is inaugurated in 1937, there are six operating theaters. During the 40s and 50s, there is a rapid development in the field of surgery. Anesthesia, surgical techniques and new drugs are developed. Fluid treatment and blood transfusions become more frequent and an early blood bank is put into use. The introduction of penicillin and other new antibiotics in the following decades, allows more operations to be performed. When the Central Complex is inaugurated in 1959, there are 26 operating theatres. For just over twenty years, the work of the operating departments has gone from nurses sharpening knives, sterilizing instruments and living close to the department to an operation where many steps are automated and performed both safer and faster.

SVEN JOHANSSON

Sven Johansson (1880–1959) is an internationally known general and orthopaedic surgeon. He is chief surgeon at Gothenburg Children's Hospital 1914–1924 and chief physician at Sahlgrenska Hospital 1924–1945. In 1936 he is made a professor of surgery. He is also a Sahlgrenska hospital's director and chief executive. He is best known for his method of treating femoral neck fractures. The operation is a smaller intervention than the older methods, has a greater chance of success and shortens the time of rehabilitation. Alongside his efforts in surgery, he drives the development of the hospital's radiology department and the establishment of the Central Laboratory. Sven Johansson is politically active and sits on Gothenburg's city council 1919–1923 for the Liberals. Between the years 1920–1930, he is a member of the Health Board. He is known for being less formal than his colleagues and is often "Sven" with both patients and staff.

JUBILEE CLINIC

The Jubilee clinic in Gothenburg is completed in 1943. It is one of four clinics financed by Gustaf V's jubilee fund to fight cancer. When the clinic opens, Magnus Strandqvist is the chief physician. He develops a cancer treatment where the radiation doses are divided into several treatments to protect the healthy parts of the body. The tumour is also irradiated from several directions at the same time. The method is the start of the development of rotating radiotherapy. Early cancer drugs begin to be used in the 50s. They are developed from mustard gas, when people exposed to the gas are found to have low levels of white blood cells. During the 50s and 60s, radioactive cobalt is used instead of radium to produce stronger radiation. From the 70s, more and better cancer drugs are developed. Cancer treatment becomes a balance between surgery, radiation and drugs.

WOMEN'S CLINIC

During the 1940s, women's clinics with special expertise begin to be established in Sweden. The women's clinic at Sahlgrenska hospital is one of the first when it opens in 1939. Births and various surgical procedures that were previously carried out in the surgical department and by surgeons without gynaecological specialist skills are carried out here. When the women's clinic opens, several modernities are highlighted, including the special children's wards where the children are to be cared for and protected from infections from visiting relatives. The clinic has several technological innovations. Elevators, radio and telephone equipment, internal communications and facilities for sterilizing materials (autoclaves). Although the 267 places are believed to be more than needed, they are not enough. The old maternity building is renovated and used between 1945 and 1968. The clinic is named KKII and moves to the newly built Östra sjukhuset.

TAGE MALMSTRÖM

Tage Malmström (1911–1995) starts working at the Women's Clinic in Gothenburg in 1949. During the 50s he develops a suction device to be used in protracted births. The suction cup is attached to the baby's scalp with the help of a vacuum and the baby is guided through the birth canal during contractions. The invention is named Vaccum extractor and is to be used in the final phase of childbirth. It soon begins to be used earlier during labor and completely replaces the birthing forceps in the departments where it is introduced. When Malmström defends his dissertation, he meets stiff resistance. The thesis is approved but receives harsh criticism and a low grade. Despite the resistance within the academy, the invention has a practical impact and spreads around the world. Use of the suction cup is easier to learn than the delivery forceps and the risks are less. Tage Malmström has a workroom in the basement of Kvinnokliniken where he develops many products. He works at the clinic in Gothenburg throughout his professional life. In 1983 he becomes professor. In 1994, Malmström receives his greatest recognition when he is awarded the International Society of Gynecology (FIGO)'s highest award for the global importance of the suction cup.

MATERNITY AND CHILDCARE CENTERS

Gothenburg's first childcare centre opens in 1926 at the children's hospital. Here children's development and health are checked. For a small fee nurses give advice on health and nutrition. During the 1940s, the state pays for the maternity and childcare centres, which rapidly increase in number. Now the health of children and mothers is checked, pregnancies are followed and monitored, information material is distributed, and children are vaccinated according to the general vaccination program.

CENTRAL LAUNDRY

The central laundry handles laundry from all hospitals within the city. It is one of the first new facilities in the expansion project and was completed in 1939. The facility is built on the assembly line principle, dirty laundry is taken in at one end of the building and clean laundry leaves at the other end. At the start, there are around one hundred employees, the vast majority of whom are women. The central linen storage for Sahlgrenska and many other hospitals in Gothenburg is here. Adjacent to the linen store is a sewing room where textiles are mended and patterns for non-standard garments are drawn up. The central laundry also has a kitchen and a staff canteen.

CENTRAL LABORATORY

"...an old microscope, a manually operated sedimenter, a test tube rack, alcohol lamp, nitric acid, Almén's reagent and litmus paper. That was about it."

Doctor Barthold Carlsson describing the Sahlgrenska hospital's laboratory, 1890s.

At the end of the 19th century, blood, urine and other body fluids are analyzed. The methods are simple and consist of a small number of different tests. When the Sahlgrenska hospital opens in Änggårdens in 1900, there is a laboratory and microscopy room in the basement of the administration building. Diseases such as tuberculosis, malaria, diphtheria, syphilis and dysentery are analyzed by laboratory nurses. A new central laboratory for chemical analyzes is included early in the plans for the fifth Sahlgrenska. Jörgen Lehmann is the head of the laboratory, which begins to be used in 1940. The work is focused on developing fast and simple methods. During the 50s, the number of laboratory assistants increases when the nursing shortage makes it more difficult to hire nurses to work in the laboratory. During the 60s, new machines are introduced which increases the capacity, now one million analyzes can be carried out every year, compared to around 100,000 in the 40s.

JÖRGEN LEHMANN

The Danish-born doctor and professor Jörgen Lehmann (1898–1989) becomes head of the Central Laboratory at Sahlgrenska Hospital in 1938. He is above all known for two medicines; the blood-thinning drug AP-dicoumarol and the first active drug against tuberculosis: PAS (Para-amino-salicylic acid). After reading an article about the metabolism of the tubercle bacterium in the journal Science, Jörgen Lehmann formulates a hypothesis in 1940 that altered salicylic acid could stop the growth of the tubercle bacterium. Three years later, the drug is manufactured. Lehmann tests PAS both on himself and on laboratory animals before clinical tests on tuberculosis patients are performed in 1944. The drug works. Together with the tuberculosis drug Streptomycin, which is developed almost simultaneously by Albert Schatz and Selman Waksman, the treatment becomes even more effective. During the 50s, an additional drug is introduced. Antibiotic treatment becomes an important part of fighting tuberculosis. Jörgen Lehmann is an inventive researcher and develops a lot of equipment himself. Among other things, a flame photometer that is used to determine the amount of sodium and potassium in serum, something that is important in renal medicine and intensive care.

THE HOSPITAL DIRECTORATE'S PHOTO ARCHIVE

The large development project on the Sahlgrenska site is carefully documented. The archive consists of approximately 700 photographs taken between the years 1932 and 1959. In the images from the 50s, not only buildings, but also ways of working and different roles are documented. The photos are collected in a photo archive. The material is used in booklets, articles, lectures and in films produced by the hospital director's office. A large number of the photographs in this room come from the hospital directorate's photo archive. They are today part of the Medical History Museum's collections.

PNEUMATIC TUBES

"A novelty was the pneumatic tubes. We could send papers and patient records between departments, outpatient clinics, laboratories and several stations. Each station had its number. This was put into a 'pod', a container which was sucked on its way to the designated station. There was also a station in the basement for the kiosk. Some sent for ice cream in the vacuum post. Sometimes the container got stuck, resulting in melted ice-cream and a spoiled container. This way of using the system was later banned."

Ulla Sterning, nurse at Sahlgrenska hospital 1948–1994



ORDER AND CONTROL

During the 1930s, the standard of living in Sweden increases. People are healthier due to hygiene, cleanliness and preventive measures such as vaccinations and information. The rapid development in medicine results in great trust in doctors and science.

Poorhouses are being replaced by nursing homes where doctors are responsible for care. Institutions including mental hospitals, asylums, and institutions for delinquent children and criminals are being built. These become places for people who cannot cope, fit in, or behave in society. It is thought that if care is good enough and there are enough places, it will solve the problems associated with those who do not fit into the social norm. In this way people who are considered undesirable are separated from society and prevented from having children. At the same time, the right to abortion is severely restricted. Prohibitions, requirements and controls often collide with people's freedoms and rights.

THE POLICE ERA IN OTERDAHLSKA HUSET 1894–1966

From 1894 to 1966, this building is the central police headquarters, with a police court and custody cells. With nationalization of the force, the police headquarters is relocated to Skånegatan. The police continue to use the old premises into the early 1970s. At the end of the 19th century, the Swedish police is structured in a different way than today. In the countryside, the bailiff is the chief of police, under him are sheriffs and quartermasters. In 1918, bailiffs and sheriffs are replaced by county prosecutors. In the cities, work is led by the police chamber and the chief of police. In larger cities, in addition to ordinary uniformed policemen, there are also plainclothes detectives (criminal police). The highest police authority is the County Administrative Board. The difference between city and countryside remains until 1965, when a state police organization is introduced.

CONTROL OF PROSTITUTES

At the end of the 18th century, syphilis is widespread in Sweden, and is a major social problem by the middle of the 19th century. The disease is transmitted through intercourse making it extra shameful. Beliefs that the disease is cured by passing it on cause people to both keep it a secret and deliberately spread the disease further in the hope of being cured. Soldiers, sailors, and seasonal workers are inspected for symptoms. Those who have the disease are sent to sanatoriums for treatment.

In the middle of the 19th century, control is focused on one group: the prostitutes. Morality officers track down and register prostitutes. Once or twice a week, the women are then required to submit to an inspection by a doctor at the police station on Östra Hamngatan. Those who miss the inspection risk forced labour. But the system is not efficient. Most people who have the disease in an early stage are not detected. Those with clear symptoms stay away from the controls. The regulation lasts until 1919. Then everyone is obliged to report venereal diseases and be treated in accordance with the Lex Veneris law. In the same year, Salvarsan, the first effective drug to treat syphilis is discovered.

INSTITUTIONALIZED CARE

During the 20th century, institutional care is expanded. In Gothenburg, Lillhagen Hospital opens for the mentally ill, Fjällbohemmet for residential care and Vasa Hospital for the old and sick. Smaller orphanages are replaced by the large Vidkärn orphanage in Kålltorp. Streters school in Kålleröd is opened for children with special needs. The number of inmates in institutions increases from around 20,000 people to around 90,000 in the middle of the 20th century. During the 1960s, the view of institutional care changes. Strictness and the focus on good behaviour are criticized and problems with being locked up and separated from the rest of society are highlighted. Being cared for at home or in a home-like environment becomes a new ideal.

CARE OF THE POOR

The poor and welfare institution Gibraltar opens in Landala in 1888. Inmates from "Bracka" on Drottningtorget and other poorhouses are moved there. There is room for a thousand people including the poor, orphans and those with mental illnesses. Though initially described as a model institute there is soon criticism for harsh rules and military order. At the beginning of the 20th century, the children are moved from the facility. During the 1930s the mentally ill are moved to Lillhagen Hospital and the poor to Fjällbohemmet. The old and sick remain at what becomes Vasa Hospital. During the 1930s, politicians plan to raise the population's standard of living to lift people out of poverty. Everyone must contribute to society's development.

RACIAL HYGIENE

Racial hygiene is a movement that spreads across the world at the beginning of the 20th century. The English word eugenics is also used. Within racial hygiene and eugenics there is a belief that mental illness, poor lifestyle and low intelligence are increasing in the population. It is explained as an effect of modern society and that more and more people have bad genetics. Sobriety, public health and a healthy lifestyle must stop the deterioration. Families with a good lifestyle and so called "good qualities" benefit through better housing, child support, school meals and health care. At the same time, society must prevent "inferior" individuals from burdening society, from passing on their characteristics and from leading a bad lifestyle. What are considered bad traits and genetics must be stopped by putting people in institutions, forbidding marriage for some and by sterilization.

STERILIZATION

Between 1934 and 1975, the Swedish sterilization laws are in force. Sterilization is carried out for eugenic, social or humanitarian reasons. Even if not everyone in the Swedish medical profession agrees on use of the sterilization laws, individual doctors have great influence over who is sterilized. Some are sterilized voluntarily at the doctor's discretion, others against their will. The laws that make it possible to forcibly sterilize people are abolished during the 1970s. During the 1930s there are demands for the right to sterilization from women's rights organisations. Having the right to be sterilized is a way of taking control of one's own child-bearing during a time when contraception is forbidden and taboo. Contraceptives are permitted from 1937 and the ban on informing about contraceptives is removed the following year.

ABORTION

Until 1864 the penalty for abortion is death. From 1921, the woman and the abortionist can escape punishment if it can be proven that the pregnancy or childbirth threatens the woman's life. From 1938, abortion is allowed for medical, humanitarian (often pregnancy after rape) or eugenic reasons. When the abortion is performed for eugenic reasons, the woman is always sterilized in connection with the procedure. Otherwise, what is known as the two-doctor certificate applies, where two doctors must approve the abortion. The conditions for obtaining an abortion are harsh and are used differently both across the country and between healthcare facilities. In some places it is basically impossible to get an abortion. For those with financial means, illegal but medically safe abortions can be arranged at high costs. Women who cannot afford this resort to dangerous methods with the risk of serious, sometimes fatal, consequences. The law on free abortion comes into force in 1975.

INSTITUTIONS

- 1799 – Gothenburg's Board for the Welfare of the Poor is founded.
- 1847 – Begging banned.
- 1847 – Rotegång (the poor labouring at different farms is forbidden for children. Poor auctioning of children becomes more usual.)
- 1864 – Death penalty for abortion abolished.
- 1918 - New care of the poor law. Rotegång (walking the parish) and poor auctions forbidden. Poor houses become retirement homes.
- 1919 – National pension is introduced.
- 1919 – Health checks of prostitutes (reglementeringen) stop.
- 1921 – No criminal punishment if there is evidence that an abortion will save a woman's life.
- 1933 – The first sterilisation laws are introduced.
- 1937 – The ban on contraceptives is lifted.
- 1938 – Abortion permitted under special conditions.
- 1942 – Sterilisation laws are extended.
- 1947 – Child allowance is introduced.
- 1957 – The Act on Social Assistance is introduced.
- 1962 – Sale of Neurosedyn stops in Sweden.
- 1964 – Birth control pills are allowed as a contraceptive.
- 1964 – The vagrancy law is abolished.
- 1969 – Marriage ban for epileptics is removed.
- 1975 – The law on free abortion comes into effect.
- 1976 – The sterilization laws cease to apply.
- 1976 – Law on free sterilization from the age of 25 is introduced.
- 2007 – Foreign women are given the right to have an abortion in Sweden.
- 2013 – Requirements for sterilization in connection with gender reassignment treatment are abolished.



A NEW AGE IN PSYCHIATRY

When Lillhagen Hospital opens in 1932, it is a modern hospital and a major municipal investment in psychiatry. Many patients who come to the hospital have previously spent a long time in hospitals and institutions without effective treatments. In the early 30s, use of new methods and drugs change psychiatric care. The biggest change is the development of psychotropic drugs, which begin to be used in the 50s.

The new medicines provide new conditions for care. From the 70s, psychiatric care moved from closed institutional care to more open forms of care. During the 90s, more and more psychiatric wards are closed. The last ward, the forensic psychiatric department, moves to new buildings at Rågården in 2013. The change from large psychiatric institutions to a more open psychiatric care where the municipality is responsible for housing and employment outside the closed care is called the psychiatric reform. For some, the change is positive, while others find it difficult to adjust from life in the hospital to life outside.

TREATMENTS

The view of what mental illness is and how it is treated has varied throughout history. During the Middle Ages, emetics, bloodletting and laxatives are used to create balance in the body. Sedatives in the form of plant medicines are also used. During the 19th century, various baths and water treatments become popular. In the infirmary, there is often no treatment at all. The troubled are locked in or restrained and special asylums are built. In the early 1800s, chains and shackles are banned. Instead, a strait jacket, restraint chair or lock-in are used.

In the middle of the 19th century, new legislation is drawn up with the aim of treating the mentally ill better. Bed-rest treatment in observation rooms is a method used at the turn of the century. Lying in bed reinforces that the patient is in hospital and needs rest. Rest is seen as the best cure. Sedatives and tranquilizers are used to keep patients in bed.

From the 30s onwards, new methods and drugs develop bringing change to the mental hospitals. The biggest change is the discovery of psychotropic drugs in the 50s. New treatments and drugs affect which patients are in the hospitals and the progression of their disease. The new medicines allow patients to live a more normal life. For some, there is the possibility of living a life outside the hospital.

LONG BATHS

At the turn of the century, long baths begin to be used to calm anxious patients. The treatment involves the patient lying in water at body temperature. The baths last anywhere from a few hours to a whole day. For those who cannot or do not want to lie down, a canvas sheet, strapped to the top of the bathtub, is used. A course of treatment may involve the patient lying in a bathtub every day for two weeks. For some patients, long baths are a regular treatment in combination with other calming treatments.

SLEEP THERAPY

During the 20s, sleep therapy becomes popular. At Lillhagen, the medicine Somnifen is used. Somnifen is a so-called barbiturate, a group of drugs discovered at the beginning of the 20th century, used for anxiety, sleep problems and epilepsy. During the 60s, barbiturate preparations are replaced by benzodiazepines. Both drug groups are highly addictive.

INSULIN

During the 1930s, the newly discovered substance insulin begins to be used to treat mental illnesses. Insulin is used to put patients into a coma. The patient is awakened using a sugar solution. The treatment is used for different mental diagnoses, but especially with schizophrenia. Insulin coma treatment is still in use in the 60s.

MALARIA TREATMENT

Malaria treatment is a new treatment in the 30s. Malaria-infected blood causes high fever peaks that stop the syphilis infection which in the neurosyphilis stage results in mental illness. The induced fever is treated with quinine and the malaria does not return. The treatment does not cure syphilis but halts the progress of the fatal disease. When antibiotics are discovered and developed, syphilis and other infections that cause mental illness can be cured. Malaria treatment becomes less common in the 40s and disappears in the 50s.

CARDIAZOLE

During the 1930s, Cardiazole begins to be used in psychiatry. The drug creates muscle spasms that are thought to improve schizophrenic and depressive conditions. During the 1940s, cardiazole treatment is replaced by ECT, electroconvulsive therapy.

LOBOTOMY

In the mid-40s, lobotomy is introduced at Lillhagen. Each year, approximately 70 patients are lobotomized. The side effects, major or minor personality changes, responsiveness and the risk of dying in connection with the operation are not considered as important as the calming effect the procedure has. At Lillhagen, the operation is performed by a neurosurgeon and the risk of death is 1 percent. Many other hospitals do not have specialist surgeons and the mortality rate can be up to 10 percent. Some patients can be discharged from the hospital after a lobotomy. Those who are not discharged can be placed in quieter wards. At Lillhagen, almost 300 people are lobotomized before the procedure is replaced by psychotropic drugs in the 50s.

ELECTROCONVULSIVE THERAPY (ECT)

Lillhagen hospital starts using ECT treatment in 1941. Initially, the treatment is carried out without anaesthesia or muscle relaxants. Today, ECT is performed painlessly under anaesthesia. ECT works best for severe depression and can have a stronger and faster effect than drug treatment. The treatment affects the brain chemistry needed to break the depression. A common side effect is temporary memory loss.

PSYCHOPHARMACEUTICALS

During the 50s, psychopharmaceuticals (drugs for mental illness) begin to be used. The first drug is chlorpromazine, marketed as Hibernal. Now the most troubled patients with schizophrenia, anxiety and obsessive-compulsive symptoms can be treated without the permanent brain damage from a lobotomy. The discovery of psychotropic drugs revolutionizes psychiatric care. Many patients' illnesses become manageable, and they can live a more normal life. Early psychotropic drugs have strong side effects. Hibernal causes, among other things, cramps, stiffness and makes the skin very sensitive to sunlight. The success of chlorpromazine leads to research on similar substances. The first antidepressant drugs arrive in the late 50s. Around the same time, benzodiazepines are produced. Drugs like Valium and Sobril have sedative effects but are also highly addictive. During the 60s, Gothenburg professor and pharmacologist Arvid Carlsson (1923–2018) leads research into the brain's signalling substances, including dopamine and serotonin. The research leads to development of drugs such as L-dopa, Abilify and Cipramil to treat Parkinson's disease, schizophrenia, and depression and anxiety disorders. Arvid Carlsson is awarded the Nobel Prize in Medicine in 2000.

OLD INSTITUTIONS

1528-1619 - Nylöse spetal

In the area of Gamlestan, in what is then New Lödöse, there has been an infirmary for the poor and sick since 1528. In connection with the establishment of the city of Gothenburg, Nylöse spetal, as it was known, changes its name to Gothenburg hospital. From the beginning, the hospital is for people with leprosy, but as the disease becomes rarer, other people are treated. Early in the 19th century, the hospital exclusively treats the insane. The hospital is located on this site from 1588, for nearly 300 years. The last hospital building is built in 1790. In 1872, the approximately 75 patients leave the defunct hospital for the newly built Gothenburg Hospital in Backa, Hisingen. The old building is used, among other things, as a residential building and is known colloquially as "Spettan". The building is demolished in 1963.

1619–1872 - Göteborgs hospital in Gamlestan.

1855–1888 – Mental healthcare and care for the poor, Drottningtorget

The large institution for the care of the poor, Gibraltar, opens in 1888 when inmates from "Bracka" on Drottningtorget and from other poor houses around Gothenburg are moved to the new facility. This institution, like its predecessors, is also known colloquially as "Bracka".

1872–1931 - Göteborgs hospital on Hisingen/ S:t Jörgens sjukhus.

1872 Gothenburg's hospital moves from Gamlestan to Hisingen. In 1931, the name is changed to St. Jörgen's Hospital. There are first-class, second-class and third-class wards. The county council takes over care from the state in 1967 and provides psychiatric care at St. Jörgen's Hospital until 1992, when patients move to Mölndal's and Kungälv's hospitals.

1888–1932 – Mental healthcare at Gibraltar institution for the care of the poor

1929–1991 - Thamstorps rest and family care center

Thamstorp castle with the associated park and garden is bought by the city of Gothenburg and from 1929 is used for the care of the mentally ill. At Thamstorp is what is known as the rest home. It is also a central home for family care that assign the sick to farms in the area.

"When I started, there were 16 patients in family care. That is, those who were out in ordinary farms, in ordinary homes. They could take one, two or three patients. Both male and female, but predominantly male. When I was there for eight, nine years, we had 250 patients in family care, in six different parishes. In Trätjärna, Fremmestad, Bäreberg parishes in Grästorp köping and in Ås and Flo parishes." Karin Dahlén, Mental health nurse 1932-2013 - Lillhagens sjukhus

1939-1987 - Lärjeholms farm

The city of Gothenburg buys Lärjeholm farm in 1895. At the beginning of the 20th century, the farm is run as a treatment home for alcoholics. In 1939, Lärjeholm's farm is used as an annex ward to Lillhagen's hospital. Female patients are treated here. From the end of the 1980s, the farm is once again run as a treatment home.

1947-1987 - Aleforshemmet

In 1947, Gothenburg's medical directorate buys Aleforshemmet and provides care for female patients with mild mental illnesses. From 1987, Aleforshemmet is run as a treatment home for people with alcohol and drug addiction.

1953-1994- Floda säteri

Floda manor is bought in 1952 to be used as an annex ward to Lillhagen's hospital. It opens in 1953, with 47 male patients.

PSYCHIATRY

During the 19th century, psychiatry becomes part of medical science. Humoral pathological explanations about body fluids are discarded and mental illness is explained with disorders of the nervous system, brain functions or due to life experiences. In the hospitals, bodily (somatic) explanations dominate. At the turn of the century, bed rest treatment is used together with a strict schedule where regular meals frame the day. The view of inheritance becomes more important and leads to attempts to prevent unwanted genetic predispositions through sterilization. Several psychotherapies are emerging. The treatments assume that the diseases have psychological causes and that they can be improved by changing thought patterns and behaviour. There are similarities to cognitive behavioural therapy (CBT).

At this time, psychoanalysis is introduced and later develops into various psychodynamic therapies (PDT). Psychotherapy initially gains limited influence in psychiatry. In most hospitals, somatic explanations dominate. During the 30s and 40s, ECT and lobotomy are used. During the 50s, psychotropic drugs come into use and change the conditions of psychiatry. During the 60s and 70s, explanatory models of mental illness appear, suggesting mental illness is a symptom of a sick society. Today, CBT therapy, where new behaviours and thought patterns are trained, is one of the most common therapy models together with psychodynamic therapy models that assume that previous experiences have a bearing on how the individual acts and reacts.

THE ATTENDANT

When Lillhagen's hospital opens, patients and attendants transfer from Gibraltar's poorhouse and the municipality's wards at St. Jörgen's hospital. Most attendants have no formal training but have learned the work on the wards. At Lillhagen hospital, basic training is started for the staff. It is divided into a practical healthcare teaching led by a nurse and a theoretical part held by doctors. Both men and women work at the hospital, but for a long time most staff are female. All nurses are women until the 50s.

The first male nurses to be trained in Gothenburg are attendants from Lillhagen Hospital who, following further training, can work in managerial positions. For assistants and substitute staff, there is no training at all. The staff work closely with the patients, they help with dressing and hygiene, they take care of basic health-

care and medication. They follow the patients between departments, treatments and therapy activities. They get to know the longterm patients. With psychotropic drugs, the hospital changes. More patients can participate in daily activities and therapy; some can be discharged to more open forms of care. For the staff, it is often about balancing the relationship with the patient: to participate in everyday life, during the treatments and to represent both "the healthy" and the hospital.

LILLHAGEN HOSPITAL

When Lillhagen hospital opens, there is room for a thousand patients in various pavilions. The patients are placed on different wards depending on their condition. There is also an infirmary, music pavilion, occupational therapy, dance floor, library, church, kitchen and staff housing. During the 1970s, the hospital is expanded. New wards and a new, larger central kitchen are built. At this time, psychiatric care moves towards more open forms of care. During the 80s, wards start to close. The large central kitchen is reduced in size before it is closed completely in 1996. The hospital is no longer the large workplace it once was. The change is also noticeable in the extensive study activities, which are gradually being cut back.

NATURE

There are green areas and beautiful nature around Lillhagen's hospital. In the large park, patients can seek peace and relaxation. In the forest areas near the hospital there are slopes covered with beautiful white wood anemones. On the other side of the road, beyond Kvillebäcken, a wetland area is created during the 90s with a rich birdlife. Patients go here when they get permission from the ward. There they can walk, sit on benches and sunbathe or just enjoy peace and quiet.

THE FENCE

When Lillhagen hospital is built there are no plans to fence off the area. After objections from the Health Board, a fence is erected around the entire area, both to keep patients in and the curious out. Perhaps people remember how families would bring picnic baskets and sit on the hills around Gothenburg hospital to "watch the fools". Outside the fence, the Bohusbanan railway track runs past Lillhagen hospital. Many train drivers feel uneasy when they drive this route. There are patients who go down to the track to end their lives.

THE BED

The bed is central to the patient and can be both positive and negative. It is a place to sleep and recover in. It is also a place to be treated, strapped in and to return to after a day of treatment and therapy.

"When I was first admitted in the fall of 1985, I got caught in a strange routine. I sat on the floor and drew the autumn forest outside and did not understand at all what I was doing at Lillhagen hospital in Gothenburg. No one had said why I was there or that I had a psychosis and what this meant. Then five people came, grabbed me and laid me on my bed, and I was given a massive dose from two syringes. I then received the same medicine for a year, during which I mostly slept. Now afterwards I know why. At the highest possible dose, it was considered to be no side effects."

Gabriella Klintred from *To live with psychosis* 2015

"The beds were not comfortable, they were those narrow steel beds. I slept there and I was strapped down there every time they would give me the syringe with medicine. Once I was given Hibernol, as a punishment. It was terrible, you walked as if you were treading water."

Stellan Svensson, patient at Lillhagen and S:t Jörgen hospital

COMPULSORY TREATMENT

Part of the history of psychiatry is about coercion. It is compulsory for the patient to be in the hospital, there is coercion directed at the body. A strait jacket, belt and lockable gloves are examples of measures taken. The strait jacket is used for violent patients but also to prevent unwanted behaviour. Bed belts begin to be used in the 20s and prevent the patient from getting out of bed. A variation on the bed belt is straps. The straps are attached around the patient's hands and feet and then attached to the bed. The patient is subjected to forced medication.

"I became a mental health nurse in 2000, and then started working at Lillhagen hospital. In the department, there was a policy that everyone in the staff should try how it felt when belted. Time passed and nothing happened. Then suddenly one day I was caught and put in a belt. It's one of the worst things I've been through. Being so exposed, and all the staff talking over my head. The experience meant that in the future I always tried to talk and calm down instead of belting."

Quote from the SKL exhibition Another era, 2010

THE PATIENT

There are many stories documented from patients who were cared for at Lillhagen and S:t Jörgen hospitals. Everyone has their own experiences, both positive and negative.

"At 7.30 it was breakfast, then you got up. It was very good food, a hearty breakfast, porridge and eggs and two dinners at 11.30 and 15.30. And supper. You got fat because Haldol and Maloron made you hungry. In a few months of Maloron, young good-looking patients who were sick for the first time became fat and lethargic. Everyone was waiting for the food. It came by lorry with ready-made portions on trays from Lillhagen's kitchen."

Stellan Svensson, patient at Lillhagen and S:t Jörgen hospital

"I was admitted to Lillhagen for acute psychosis. Had not eaten or slept for several days and was in a very nervous state. I was angry and yelled at the staff because I didn't want to take any medication or be admitted. Then two strong men came and forcibly dragged me into a small room. They wrestled me down onto a bed. A doctor came in with nurses and carers. Eight people stood around me where I lay. The doctor took out a syringe. They pulled my pants down and injected medicine into one buttock. I was absolutely convinced that they were executing me with poison. I thought: 'Now I'm dying - and no one outside the hospital knows anything! Like in a concentration camp...' But of course I survived. Two weeks later I felt so well that I was discharged from Lillhagen."

Quote from the SKL exhibition Another era, 2010

CENTRAL KITCHEN

When the hospital is upgraded in the 70s, a new central kitchen is built. Food is prepared for Lillhagen's hospital and healthcare facilities in the surrounding area. Every day, several thousand portions of food are prepared for, among others, Lillhagen, S:t Jörgen and Lundby hospitals. The food is driven out in trolleys using trucks in the underground culvert system. Breakfast, lunch and dinner are portioned using conveyor belts before the trays are placed in trolleys to be driven away. When trucks and lorries return, the content is unloaded and taken for dishwashing. When the Central Kitchen is at its largest, hundreds of people are employed there. Many people come to Lillhagen to work in the kitchen, both as permanent staff and as summer temps.

"We talked a bit and then she wanted to see my workbook. Then she told us about the kitchen, about the production, conveyors and dishwashing. That would be my job for some time. Then she told us: We prepare about 2,700 portions per meal, and in addition to that about 1,000 portions of staff food. After that we went to the kitchen. It was a little nerve-wracking with a new place and no one I knew, but it would be my workplace for 21 years."

Christer Andersson, working in the Central kitchen 1975–1996

SPIRITUALITY

The church has an important role in healthcare. Here there is time to talk about spirituality or difficult things in life. After Lillhagen church is deconsecrated, the church activity moves to another building where it stays until the hospital closes.

"We had conversations every day. Partly we spoke to people who were not allowed to leave the wards, partly because the meeting rooms in the church and the entrance to the library were opposite each other. Many patients walked between the library and the meeting rooms. Most calls were not scheduled, people came with a question or wanted to sit and pray together for something that was important. It could be that you would be discharged or that you would finally see a doctor who understood you. It could also be that a patient had lost a relative and could not attend the funeral. Then we could organize a small memorial service so that the patient himself would feel that "I still buried my mother."

Birgitta Fält, psychologist, worked in Lillhagen church from 1992

PUTTO

The small child figure with wings is a so-called putto which hangs over the pulpit in Lillhagen church. The church is built at the same time as the hospital. The putto is made of carved pine and painted gold. In its hand it holds a small blue cross. The black and white photo is taken at the beginning of 1935, the same year that the church is officially inaugurated. The photo shows the altarpiece with signs for Easter hymns by Johan Olof Dahlin from the 1819 hymn book. After forty years, the church activities end, and the church is deconsecrated in 1975. The inventory is moved to congregations in the surrounding area.



OCCUPATIONAL THERAPY AND STUDY ACTIVITIES AT LILLHAGEN

During the early infirmary period, those who are able are put to work. It is both a way to occupy the inmates and support the hospital. During the 19th century, woodchopping, handicrafts and gardening are called occupational therapy. The work is assessed according to how useful it is. It is primarily the result that is assessed, but also the moral and social effects for the patient. Society's rapid industrialization around the turn of the century means that the emphasis on strict work discipline increases.

In the 40s, occupational therapy developed in a different direction. Now the patient's experience of the work and individual needs are given greater focus. It is no longer the end product that is important but the patient's development. The work becomes more of a therapeutic method. When Lillhagen opens, occupational therapy has an important role. The hospital has spacious and bright workrooms for weaving, tailoring and shoemaking, crocheting, typing and sewing. At the hospital, there are also opportunities for gardening, including growing food and flowers.

HAKON SJÖGREN

Psychiatrist Hakon Sjögren becomes chief physician at Lillhagen hospital in 1940. He works at the hospital until his retirement in 1964, the last years as the hospital's director. He works on developing methods to diagnose mental illness, improve the hospital environment and activate patients socially. Hakon Sjögren does early research on dementia diseases and is a pioneer in Sweden in his research on Alzheimer's disease. He is committed to occupational therapy and pushes the issue of improving it in mental hospitals. He believes that occupational therapy is one of the forms of treatment that can easily reach many patients without

simultaneously increasing the doctors' workload. For the staff to have the right skills, he suggests training for occupational therapists. The training starts at Slöjdföreningen's school during the 40s.

Hakon Sjögren opposes claims that occupational therapy is not profitable. For him, occupational therapy is primarily a therapeutic and medical concern. The important thing is that patients have access to suitable occupational therapy and can practice it. He turns against the view that occupational therapy is a matter of cost and production.

STUDY ACTIVITIES

Study activities at Lillhagen Hospital begin in 1957 in a painting group led by the artist Bængt Dimmig. A few years later, Eva White is hired to develop the activity. The goal is to give patients a chance to encounter culture and society. During the early 1960s, there are only courses in art, but the range of activities increases at a rapid pace. More teachers are employed in collaboration with ABF (Workers' educational association) and the University of Gothenburg. At most there are fifty teachers. Between 1963 and 1975, the number of courses increases from 10 to 851 with art, music, cooking, typing, languages, ceramics, theater and more. Trips and excursions are also organized. The study activities are not a therapeutic activity. The teachers do not know what illnesses the patients have. Everyone participates voluntarily based on their circumstances.

The activities are described as an oasis, a haven from being hospitalized. Courses are given in the evenings and weekends so that the patients have somewhere to go "after work". Exhibitions are held in Gothenburg and beyond. The name "Lillhagen Painters" is agreed before the first exhibition at the Gothenburg Art Gallery in 1968. It soon becomes an established name. During the 1980s, economic austerity strikes. When psychiatric care is reorganized into sectors, it affects how money, premises and activities are distributed. When the hospital closes, study activities for the same target group start at other locations in Gothenburg. But there is no equivalent to the large, combined activities that were carried out at Lillhagen hospital

EVA WHITE

Eva White (1923–2020) is hired in 1963 as head of study activities. She remains until 1986 when she leaves her job in protest against cutbacks. Eva White is a trained gymnastics director and is the driving force behind the study activities. She finds suitable course leaders, makes sure that patients are aware of the courses and that there are money and premises. She does not teach but is described as constantly working, always on the move, often with a cup of coffee or a cigarette in her hand. She participates in the excursions and trips that are organized. Some of the trips are abroad, to Mallorca and Madeira. Doctors accompany the patients on long trips.

She works to break the prejudices that exist about mental illness and protects the participants' integrity. No assessments are made of the performance, but it is possible to get a certificate after completing a course. In the book "Lillhagenmålarna" (1989), she highlights that the interaction between patients and staff is important and that it is an advantage that the staff within the study activities are not medically trained. She questions the new goals of "*discharging everyone to their own accommodation at all costs*".

CREATIVE ACTIVITIES

In an article from 1950, senior physician Hakon Sjögren describes some basic requirements for a functioning occupational therapy. It should be part of the hospital's therapies and not have any special status. There must be large, well-planned spaces, centrally located on the hospital grounds so that doctors can easily have close contact with occupational therapists and patients.

"I have been in Lillhagen hospital, which was an old-fashioned psychiatric hospital. There was a lot of occupational therapy, social activities and physical therapy. That is something I miss in today's psychiatry. I experienced the creative activity in occupational therapy as very positive. Like being able to hit the dust out of hard rag rugs when you've been manic and maybe a little aggressive or sitting and fiddling with a tapestry or sewing a skirt when you've been depressed. Doing something that gives results. When you were in the occupational therapy rooms, you also didn't identify yourself as sick, but as a person with potential who could do something creative, and that meant a lot for recovery."

Quote from the SKL exhibition Another era, 2010

AFTER LILLHAGEN

The early 2000s means the end of Lillhagen hospital. When forensic psychiatry moves to Rågården in Angered in 2013, there is no psychiatric treatment left at the site.

What was once called Lillhagen hospital is now called Lillhagen Park and more and more buildings are converted into housing. Today, psychiatric care is provided within Sahlgrenska University Hospital. Psychiatric departments and psychiatric wards are available at Sahlgrenska, Östra and Mölndal hospitals. For those who are treated in psychiatric outpatient care, there are clinics around the city. Most patients live in their own apartment, group, short-term or other adapted accommodation.

Creative, voluntary activities can be found in the four municipal activity centers and within a couple of private foundations. Psychopharmaceuticals and other treatments are still developing.

Göteborg 2023-06-28



WE MADE THE EXHIBITION

FIRE AND BLOOD 2023

<i>Idea</i>	- Medicinhistoriska museets personalgrupp
<i>Exhibition curator</i>	- Annika Engström
<i>Content</i>	- Robert Wallsson
<i>Research</i>	- Robert Wallsson, Lisa Sputnes Mouwitz, Christer Andersson, Erika Jacobsson Anna Stow
<i>Conservator</i>	- Anna Stow
<i>Exhibition design</i>	- Annika Engström
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<i>Interior carpenter</i>	- Bruce Wood - Ulf Bruce, Per Vihlevi
<i>Miniatures</i>	- Lena Sandberg
<i>Lighting design</i>	- JS Light - Jan Simon, Per Petersson
<i>Sound recordings</i>	- Mediabyrån
<i>Carpenter</i>	- Kållereds bygg, Christian Ohlsson, Kamil Lukaszczuk, Leo Ahmadi
<i>Painting</i>	- Målab
<i>Audiovisual</i>	- AVS i Sverige
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