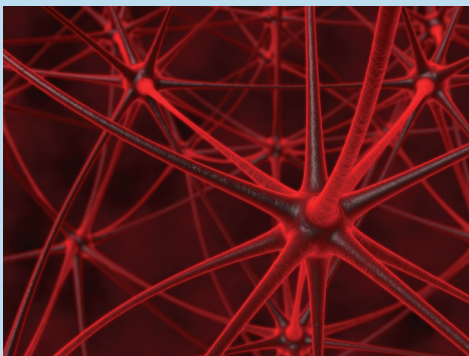
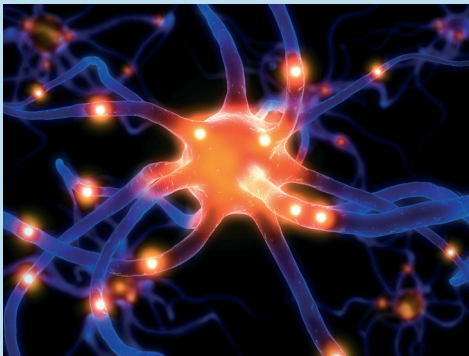
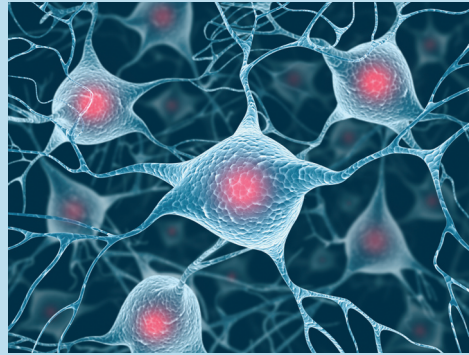
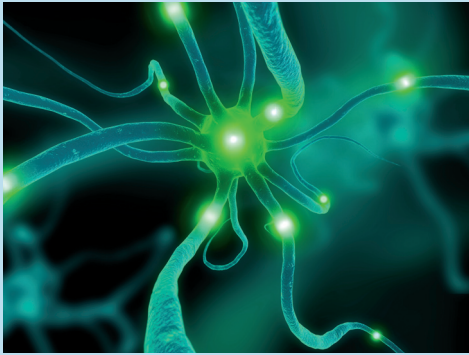
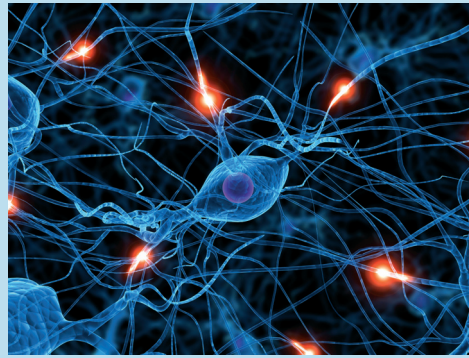
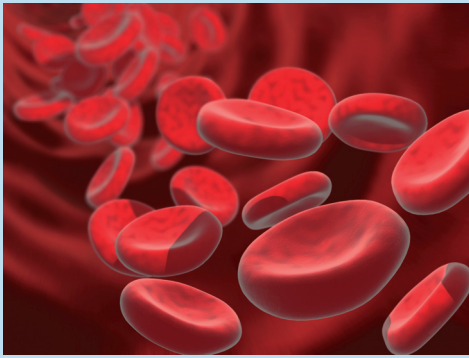


HNA HOMOLCE
HOSPITAL

Accredited by JCI



A N N U A L R E P O R T
2009



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ABOUT US

- We provide healthcare in all areas of medicine
- We specialise in disorders of the cardiovascular and nervous systems
- We offer state-of-the-art diagnostic and therapeutic procedures some of which are unique in the Czech Republic
- We use fast and minimally invasive methods to diagnose and treat the patient's condition
- Our specialists are professionals in their fields

MANAGING DIRECTOR'S OPENING STATEMENT

Dear Friends,

2009 was an important and challenging year for the Na Homolce Hospital. It brought about many positive changes, which we are sure will be reflected in a higher quality and safety of the care we provide to our patients.

As a doctor, I am glad that we have been able to install a new Leksell gamma knife, Perfexion model, replacing the old one after 17 years of use. Thanks to government subsidy, we can now enjoy new opportunities to treat tumorous diseases of the head, neck and the cervical part of the spinal column, and the treatment is more comfortable and safer for the patient. This state-of-the-art device is expected to serve Czech patients well for at least ten years to come.

Last year's successes certainly include the opening of the refurbished suite of neurosurgery operating theatres and rooms, including magnetic resonance facilities for use during surgery. These new technologies make brain and spinal column surgery much more precise and safe.

The purchase of the new hybrid PET/CT camera is certainly another good achievement: it has almost doubled our excellent PET Centre's examination capacity, which is of substantial importance for the diagnostics of oncological patients.

In September 2009, the Na Homolce Hospital successfully passed an audit conducted by the Czech Ministry of Health with focus on cardio centres. On the basis of the results of the audit, the hospital gained the status of Comprehensive Cardiovascular Centre in December 2009. I believe we will be able also gain the status of Comprehensive Cerebrovascular Centre in the near future.

The Na Homolce Hospital is one of the rare state hospitals that are profitable. Last year our profit was around CZK 50 million. We would like this trend to continue in the years to come. The management of the hospital has the following priorities: pay good salaries to good employees; invest in new technologies, using combined funding sources; and ensure that assets are utilised economically. Our focus is on the quality and safety of our patients' treatment and our ultimate goal is the satisfaction of patients discharged from our hospital.

Dear friends, allow me to thank all employees of the Na Homolce Hospital for the good work they did in 2009. I wish all of us to be strong and firm enough to be able to reach a similar level of achievement this year.

Vladimír Dbalý, MD, MBA
Managing Director,
Na Homolce Hospital



HOSPITAL MANAGEMENT AND BODIES



Vladimír Dbalý, M.D., MBA
Managing Director



Michal Toběrný, M.D.
Director for Treatment
and Preventive Care



Eva Holá, M.Sc.
Director of Nursing Care



Stanislav Adam, M.Sc.
Director of Hospital
Operations



Barbora Vaculíková, M.Sc.
Director of Dept.
for Quality and Safety

ORGANIZATIONAL STRUCTURE

MANAGING DIRECTOR				EXTERNAL AUDIT
<div style="background-color: #0070C0; color: white; padding: 2px;">Division of Managing Director</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Secretariat of the Managing Director</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Hospital Pharmacy</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Human Resources Division</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Staff Matters</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Training and Development Department</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Salaries Specialist</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Lawyer</div> <div style="background-color: #0070C0; color: white; padding: 2px;">PR and Press Officer</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Marketing Department</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Contracts and Revisions</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Quality Control</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Health and Safety at Work</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Fire Protection and Emergency Planning</div>	<div style="background-color: #0070C0; color: white; padding: 2px;">Treatment and Preventive Care Division</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Deputy Director of TPC</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Balneological Care Dept.</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Health Care Economics Department</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Biomedical Engineering Department</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Medical Physics Department</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Staff Doctor</div>	<div style="background-color: #0070C0; color: white; padding: 2px;">Technical Operations Division</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Deputy Director of Techn. Operations Chief Nursing Officer</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Departments</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Housekeeping</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Material and Tech. Supplies and Stores</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Catering</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Car Fleet</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Automated Transportation System</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Energy and Water Management</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Maintenance</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Technical and Inspection Activities and Revision</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Technical Control of Operations</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Accommodation</div> <div style="background-color: #0070C0; color: white; padding: 2px;">IT</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Waste Management and Environmental Protection Services</div>	<div style="background-color: #0070C0; color: white; padding: 2px;">Nursing Division</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Náměstek pro ošetrovatelskou péči</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Commercial Services and Documents Department</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Central Operation Theatres and Central Sterilisation</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Head of Non Medical Healthcare Staff</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Public Health Protection Assistant</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Mobile Nursing Team</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Casualty Service Ambulance Attendants</div>	<div style="background-color: #0070C0; color: white; padding: 2px;">Economic Administration of the Hospital</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Bialešová s.r.o.</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Departments</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Budget Administrator</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Financial Accountancy</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Operative Files</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Controlling</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Managerial Accountancy</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Medicínsko právní služby</div> <div style="background-color: #0070C0; color: white; padding: 2px;">JUDr. MUDr. Roman Žďárek, Ph.D. Lawyer</div>
	<div style="background-color: #0070C0; color: white; padding: 2px;">CARDIOCENTRE</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Cardiology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Cardiac Surgery</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Cardiac Anesthesiology</div>	<div style="background-color: #0070C0; color: white; padding: 2px;">Wards of specialised depts. that are not parts of the Centres</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Vascular Surgery</div> <div style="background-color: #0070C0; color: white; padding: 2px;">General Surgery</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Gynecology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Internal Medicine</div> <div style="background-color: #0070C0; color: white; padding: 2px;">ENT</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Anesthesiology and Resuscitation</div>	<div style="background-color: #0070C0; color: white; padding: 2px;">Out-patient parts of spec. depts. that are not parts of the Centres</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Vascular Surgery</div> <div style="background-color: #0070C0; color: white; padding: 2px;">General Surgery</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Gynecology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Internal Medicine</div> <div style="background-color: #0070C0; color: white; padding: 2px;">ENT</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Nephrology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Ophthalmology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Paediatric and Adolescent Dept.</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Dentistry</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Dermatology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Allergology and Clinical Immunology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Psychiatry</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Clinical Psychology</div>	<div style="background-color: #0070C0; color: white; padding: 2px;">Common Examination and Therapeutic Units</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Clinical Biochemistry, Haematology and Immunology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Clinical Microbiology and Antibiotic Unit</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Radiodiagnosics</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Nuclear Medicine/PET Centre</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Pathology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Rehabilitation and Rheumatology</div> <div style="background-color: #0070C0; color: white; padding: 2px;">Hospital Hygiene</div>
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NA HOMOLCE HOSPITAL

A specialized healthcare center providing cardiovascular and neurosurgical treatment nationwide

Neurological-neurosurgical program

Comprehensive care for patients suffering from diseases of, or injuries to, the central and peripheral nervous system, as well as diseases of, or injuries to, the spine. The three independent program units provide a full range of care, from diagnostic services and therapy by conservative methods, through complex neurosurgical operations, including radiosurgery and stereotactic surgery, to the latest methods of interventional neuroradiology. Part of the treatment process also covers related physiotherapy and long-term follow-up of patients.

- ✓ Department of Neurology
- ✓ Department of Neurosurgery
- ✓ Department of Stereotactic and Radiation Neurosurgery

Cardiovascular program

Comprehensive care for patients suffering from diseases of the cardiovascular system, i.e. the heart and blood vessels. The three independent program units focus on complex diagnostics and treatment by conservative methods, as well as surgical treatment of cardiac and vascular diseases including interventional radiology. Medical care includes special physiotherapy for patients with diseases of the circulatory system and follow-up of selected groups of patients.

- ✓ Department of Cardiology
- ✓ Department of Vascular Surgery
- ✓ Department of Cardiac Surgery
- ✓ Department of Cardioanesthesiology

General medical care program

A comprehensive range of general healthcare treatment, supported by a large outpatient department and related wards. The four independent hospital wards within this program offer patients a complete range of modern diagnostic and therapeutic methods for diseases related to internal medicine and general surgery, with a focus on minimally invasive surgery. These are closely linked to the extensive outpatient services provided by individual departments.

- ✓ Department of Internal Medicine
- ✓ Department of Surgery
- ✓ Department of Gynecology and Minimally Invasive Surgery
- ✓ Department of ENT/Head and Neck Surgery

PROFILE OF THE NA HOMOLCE HOSPITAL

Tables

Number of beds as of December 31, 2009

	ICU beds	Total	Share in %
Neurological-Neurosurgical Program	26	106	30%
Cardiovascular Program	63	147	41%
General Medical Care	39	104	29%
Total	128	357	100%

Basic Information

	Year 2009
Number of employees	1 763
Number of beds	357
Number of hospital admissions	19 298
Number of surgeries	14 420
Number of examinations at outpatient clinics	1 122 145

Mortality 2009

Name	Mortality
Vascular Surgery	2,1%
Cardiac Surgery	1,8%
Cardiology	1,1%
Neurosurgery	1,2%
Stereotactic and Radiation Neurosurgery	0,0%
Neurology	1,7%
General Surgery	0,3%
Gynecology	0,0%
ORL	0,1%
Internal Medicine	3,7%
Anesthesiology and Resuscitation	30,3%
NHH	1,5%

Average duration of care

Name	Days
Vascular Surgery	7,72
Cardiac Surgery	11,04
Cardiology	2,98
Neurosurgery	8,3
Stereotactic and Radiation Neurosurgery	1,37
Neurology	5,4
General Surgery	3,85
Gynecology	3,12
ORL	2,67
Internal Medicine	7,68
Anesthesiology and Resuscitation	17,55
NHH total	5,4

PROFILE OF THE NA HOMOLCE HOSPITAL

Tables

Number of days of care

Name	Days
Vascular Surgery	16 368
Cardiac Surgery	10 426
Cardiology	15 080
Neurosurgery	20 199
Stereotactic and Radiation Neurosurgery	1 009
Neurology	7 336
General Surgery	8 908
Gynecology	6 527
ENT	2 737
Internal Medicine	8 448
Anesthesiology and Resuscitation	2 668
NHH total	99 706

Bed capacity utilisation in %

Name	Bed capacity utilisation in %
Vascular Surgery	83,94
Cardiac Surgery	85,04
Cardiology	81,62
Neurosurgery	92,07
Stereotactic and Radiation Neurosurgery	65,48
Neurology	69,04
General Surgery	82,97
Gynecology	78,75
ENT	69,17
Internal Medicine	89,72
Anesthesiology and Resuscitation	93,12
NHH	83,36

Overview of diagnoses for hospital admissions in 2009

	2009
Diseases of the nervous system	14%
Diseases of the airways	2%
Diseases of the circulatory system	40%
Diseases of the digestive tract	5%
Diseases of the muscular and osseous system and connective tissues	13%
Diseases of the urogenital system	12%
Other diagnoses not included in the options	14%

HIGHLIGHTS OF 2009

FEBRUARY

- | Opening of a new complex of neurosurgical operating theaters with intraoperative MRI.
- | Putting a new state-of-the-art hybrid PET/CT scanner into operation.

SEPTEMBER

- | Na Homolce Hospital underwent successfully the audit of cardiocenters conducted by the Ministry of Health CR.

NOVEMBER

- | Putting a new Perfexion Leksell gamma knife into the pilot clinical operation.
- | Opening of a new mammary diagnostics section and installation of a new mamograph.

DECEMBER

- | Christmas theater performance "Rock'n'roll" in the National Theatre for the staff and partners of the Na Homolce Hospital.
- | Based on the audit of the Ministry of Health CR, the Na Homolce Hospital was granted the statute of Cardiocenter of 1st grade.

PERSONNEL AND SOCIAL POLICY

In terms of the personnel policy, the year 2009 was for the Na Homolce Hospital very successful. After a long time the Hospital succeeded in filling all the planned positions of general nurses and physiotherapists.

Several personnel changes were made during the year. Based on the selection procedure, Ing. Stanislav Adam was appointed Director of Hospital Operations. Ass. Prof. Petr Neužil, M.D., PhD., FESC was appointed Head of the Department of Cardiology and Štěpán Černý, M.D. PhD. Head of the Cardiocenter. Vojtěch Košan, M.A. was entrusted with the management of the hospital pharmacy.

Personnel and salary data by individual categories

	Physicians	Pharmacists	General nursing staff	Non-physician healthcare staff § 7 – 21	Non-physician healthcare staff § 22 -28	Non-physician healthcare staff § 29 - 42	Other specialized staff – non-physicians	Technicians	Workers	Total
Total salaries paid (CZK)	236 221 768	3 888 032	286 915 072	47 106 481	20 645 897	50 313 642	2 515 339	87 711 525	36 577 937	771 895 693
Average number of employees (FTE)	258,06	6,15	741,86	113,26	43,22	197,16	4,77	240,18	158,53	1 763,19
Average salary	76 281	52 683	32 229	34 660	39 808	21 266	43 944	30 433	19 228	

Within the grant programme of the Ministry of Health CR, 2009 Resident Positions, the Department of Radiodiagnosics acquired 1 position for a resident physician.

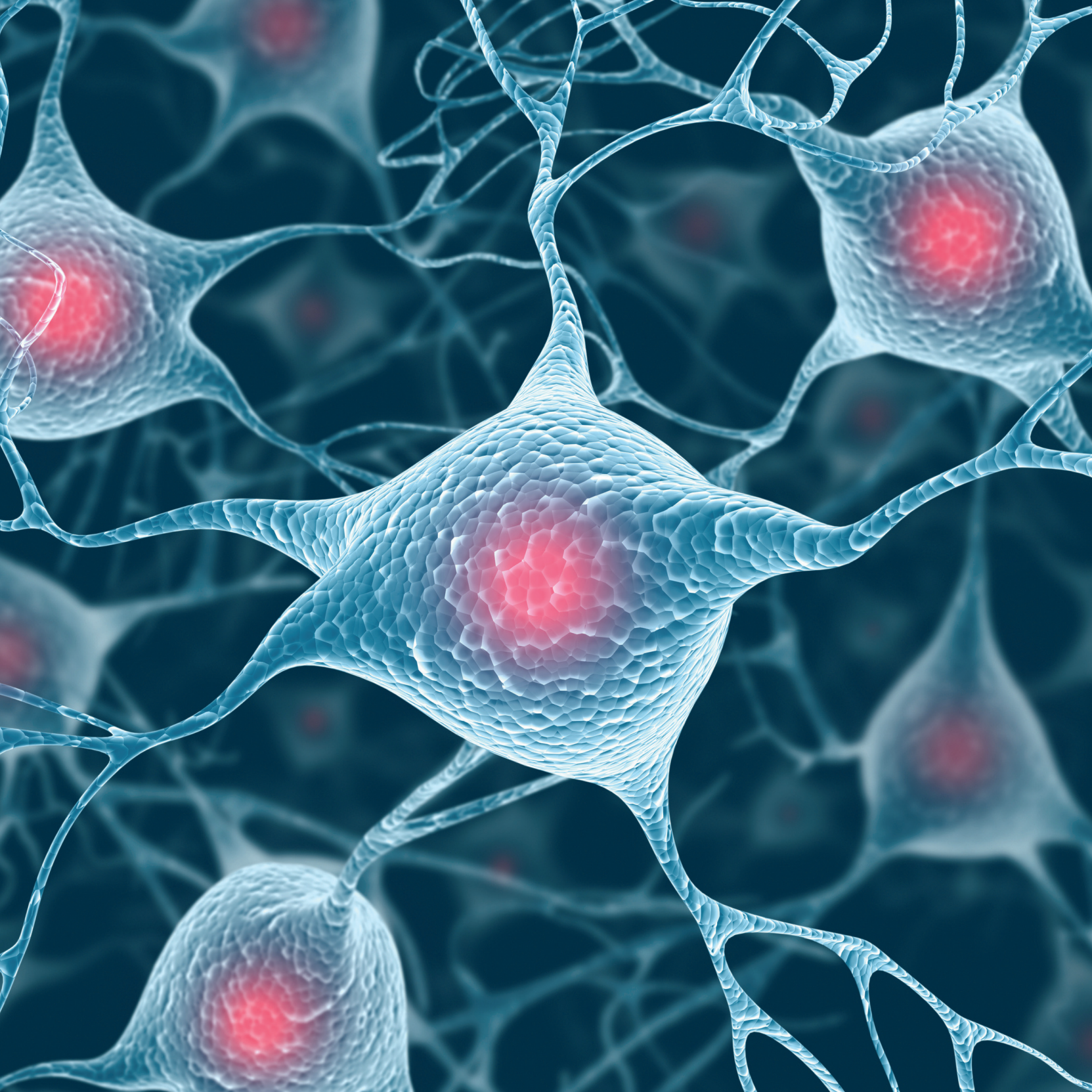
Throughout the whole year, the Department of Anesthesiology and Resuscitation organizes for our general nursing staff and for the general nursing staff from other facilities, practical training based on the granted accreditation for practical training within the educational program for specialized training of non-physician healthcare staff in the field of Nursing service in anesthesiology, resuscitation and intensive care.

In 2009, the Na Homolce Hospital employed 1763 employees (average FTE) and the average salary increased to CZK 38 948. Staff salaries totalled CZK 772 million. A change was made in the rules for mid-year bonuses. According to the new rules, these bonuses are set for all categories of employees pursuant to specified parameters.

Personnel and salary data for individual employee categories is shown in the table below.

The Training and Development Department organized two national conferences focused on the Neuroprogram and the Cardiovascular program.

The Na Homolce Hospital creates the Cultural and Welfare Fund in compliance with Decree no. 114/2002 Coll. This fund is used for benefits paid to the Hospital employees in the area of culture, sports, social needs and healthcare.



OUR ACTIVITIES

CLINICAL PROGRAMS – SUMMARY OF ACTIVITIES



NEUROLOGICAL-NEUROSURGICAL PROGRAM (NEUROPROGRAM)

It offers comprehensive care to patients with diseases of or injuries to the central and peripheral nervous system and with diseases of or injuries to the spine.

NEUROLOGICAL-NEUROSURGICAL PROGRAM (NEUROPROGRAM)

DEPARTMENT OF NEUROLOGY

Head of Department Miroslav Kalina, M.D.

The department focuses on diagnostics and non-surgical treatment of diseases of the brain, spinal cord, peripheral nerves and muscular apparatus, using special electrophysiological and ultrasonic diagnostic methods. It also provides complex outpatient and ward care in these specialized areas.

The department includes an **Epilepsy Center**, providing specialized outpatient and ward care for patients suffering from epilepsy. This comprises two epilepsy counseling units and an epilepsy monitoring unit (EMU) which, in addition to its other activities, conducts long-term monitoring and selection of patients for epileptosurgical treatment and provides consultancy for neurological centers throughout the Czech Republic. In 2009, 248 patients were admitted to the EMU, of whom 10 were monitored by surgical implantation of electrodes and 32 were indicated for epileptosurgical treatment – open surgery, implantation of vagus nerve stimulator or stereotactic thermolesion. The method of stereotactic thermolesion was used to treat 12 patients and the Na Homolce Hospital is the only center in the world

that performs this treatment of temporal epilepsy in such a scope and with the results comparable with those of open epileptosurgery. Characteristic for the treatment of epileptic patients is a close interdisciplinary cooperation between the Hospital's neuroscience departments. Alongside the Department of Neurology, the following departments traditionally participated in their treatment: the Department of Neurosurgery, the Department of Stereotactic and Radiation Neurosurgery, the Department of Radiodiagnostics and the Department of Nuclear Medicine/PET Center. Na Homolce Hospital is one of the three largest epilepsy and epileptosurgical centers in the Czech Republic, with the highest number of operated on patients.

The **Specialized Intensive Care Unit** for the treatment of acute and critical neurological cases also serves as a postgraduate training center for neurological intensive care. In the course of 2009, 14 intra-arterial thrombolyses and 22 intravenous thrombolyses were performed on intensive care patients, which is a slight increase as compared to 2008.

NEUROLOGICAL-NEUROSURGICAL PROGRAM (NEUROPROGRAM)

The department focuses on diagnostics and non-surgical treatment of diseases of the brain, spinal cord, peripheral nerves and muscular apparatus, using special electrophysiological and ultrasonic diagnostic methods. It also provides complex outpatient and ward care in these specialized areas.

In addition to the outpatient clinic for the treatment of general neurological disorders, the outpatient care includes the **neurovascular clinic** and the **spinal counseling unit**, which also refers patients for surgical interventions to the spinal canal, and the **counseling unit for extrapyramidal disorders** and **for neuroimmunological CNS diseases**. The diagnostics section comprises **the evoked potentials laboratory, the EEG laboratory, the electromyographic laboratory** and **the transcranial Doppler ultrasound unit**.

Developing its activities in the past period was also the **Sleep Disorder Center** which includes a sleep laboratory with two monitored beds enabling monitoring by sleep polygraphy. In 2009, 202 patients were admitted to the Center due to sleep disorders.

In 2009, physicians of the Department of Neurology were involved in undergraduate teaching for 1st and 3rd Faculties of Medicine of Charles University and in postgraduate teaching within the Institute for Postgraduate Studies.

Basic data

Number of beds	33
- Standard	21
- Intensive	6
- EMU	4
- Sleep laboratory	2
Number of physicians	14
Number of general nursing staff	61
Number of outpatient examinations	18 824
Number of admissions	1 341
- Bed occupancy rate (as a %) - standard care	77,2
- Bed occupancy rate (as a %) - intensive care	96,2
Average length of stay (in days)	5,3
- Standard	4,9
- Intensive	10,1

NEUROLOGICAL-NEUROSURGICAL PROGRAM (NEUROPROGRAM)

DEPARTMENT OF NEUROSURGERY

Head of Department Michal Šetlík, M.D.

In 2009, the Department of Neurosurgery focused on further developing its complex diagnostic, surgical and follow-up care for patients suffering from diseases of the central and peripheral nervous system in order to provide a comprehensive and safe treatment to improve the quality of life of its patients.

The four standard key areas of patient therapy, namely the **neurooncological, neurovascular, epileptosurgical and spinal programs**, were complemented by a **new specialization in neurointensive care**. The total number of operations performed during 2009 was 2,495 which is a 10% increase as compared to 2008. In total, 2,367 patients were admitted to the Department's wards and 11,909 patients were treated in the outpatient departments which is again a 10% increase as compared to 2008. Department of Neurosurgery is a center with a distinct above-regional coverage in the treatment of a number of diagnoses, both in national and international terms.

In February 2009, the reconstructed complex of operating theaters was opened. A new multifunctional operating section with a newly installed intraoperative magnetic resonance imaging (MRI), a set of neuronavigation systems, a surgical microscope of the latest generation and other equipment ranks the Department of Neurosurgery of the Na Homolce Hospital among the prominent departments of neurosurgery all over Europe. Uniqueness of the operating complex consists not only in the technical equipment itself, but primarily in the possibility to integrate operating theater technologies in order to provide patients undergoing operations of the brain, spinal cord or spine with a high standard of a precisely targeted, most efficient and safe treatment.

In **the Neurooncological program**, in addition to a standard and usually combined treatment of patients, the cooperation within the TTF project (the treatment of malignant primary cerebral tumors by magnetic pole) further continued. The Na Homolce Hospital participates in a multicentric randomized international study of this type of treatment. The use of perioperative navigation and functional navigation during cerebral surgery was intensively developed during 2009, through the **Center of Excellence in navigated neurosurgery for the Czech Republic and countries in the East European region**.

Inter-sectoral neurooncological seminars attended by a multidisciplinary team of specialists from Na Homolce Hospital and oncologists from the Motol Teaching Hospital, who recommend suitable follow-up oncological treatment, were held regularly in the period under review.

Under **the Neurovascular Program**, the Department of Neurosurgery continued to centralize patients with diseases of the intracranial vessels at the Na Homolce Hospital during 2009, offering the option of combined treatment of these diseases by open surgery or endovascular intervention. A team of experienced specialists provide patients suffering from these potentially life-threatening diseases with 24-hour care.

In cooperation with the Department of Neurology, criteria for indicating patients for decompression craniectomy were set for certain types of strokes due to ischemia and for bypass surgeries between extra- and intracranial blood vessels.

If these conditions are treated with open surgeries, the perioperational dopplerography of intracranial arteries is uniquely used. With a new surgical microscope it was possible to introduce into routine

NEUROLOGICAL-NEUROSURGICAL PROGRAM (NEUROPROGRAM)

In 2009, the Department focused on further developing its complex diagnostic, surgical and follow-up care of patients suffering from diseases of the central and peripheral nervous system.

practice the intraoperative infrared fluoroscopic angiography allowing intraoperative checking of patency of vessels during surgery and particularly after clipping of cerebral aneurysms.

The Department of Neurosurgery of the Na Homolce Hospital participates in the international double blind randomized multicentric study CONSCIOUS-2 focused on treatment of vasospasms after operations of bleeding brain aneurysms.

Within **the Epileptosurgical Program**, Department of Neurosurgery of the Na Homolce Hospital is one of the largest centers in the Czech Republic. Working together with the Department of Neurology, the Leksell Gamma Knife unit, the Department of Radiodiagnostics and the PET Center, the total number of indicated and operated on patients stabilized at between thirty and forty annually and the total number of patients with drug resistant epilepsy operated on here has already reached around 250. Resections were performed on patients using standard navigation techniques and stimulation treatment (the application of vagal nerve stimulators) was also applied. Treatment of chronic pain was further developed in cooperation with the Anesthesiology and Resuscitation Department (neurostimulation of the spinal cord).

Within the framework of **the Spinal Program**, the Department of Neurosurgery has ranked for several years now as one of the most successful and active centers in the Czech Republic. The surgeries are performed on the whole length of the spine using all access paths to treat degenerative diseases as well as trauma and oncological pa-

tients. So called “minimally invasive” spondylosurgery, using navigational or transcutaneous techniques is by far the preferred method. In 2009, in the surgeries of indicated spinal diseases, particularly in the region of thoracic and cervical spine, intraoperative CT-guided navigation system was repeatedly used. Its use significantly increases safety of surgical interventions.

The Department of Neurosurgery of the Na Homolce Hospital is a **Center of Excellence in neurosurgery for the dynamic stabilization of the cervical spine** (Bryan, Prestige, Prospace, Discover) **for the Czech Republic and countries in the East European region**. The dynamic stabilization technique was intensively used also in surgeries of the cervical and lumbar spine in the period under review.

In 2009, the team of the Department of Neurosurgery was involved in postgraduate teaching within the Institute for Postgraduate Studies.

NEUROLOGICAL-NEUROSURGICAL PROGRAM (NEUROPROGRAM)

Basic data

Number of beds	65
- Standard	45
- Intensive	8
- Intermediate	12
Number of physicians	18
Number of general nursing staff	86
Number of outpatient examinations	11 909
Number of admissions	2 367
Number of days of treatment	20 199
Bed occupancy rate (as a %)	92,07
Average length of stay (in days)	8,3

Breakdown of surgical interventions

Cerebral tumors	259
Cerebro-vascular diseases	76
Functional – MVD	16
Spinal diseases including tumors	1 372
Injuries	85
Epileptosurgery	18
Other	669
Total	2 495

Number of surgical interventions

2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
1744	1837	1930	1974	2 203	2 107	2 115	2 226	2 152	2 495

NEUROLOGICAL-NEUROSURGICAL PROGRAM (NEUROPROGRAM)

DEPARTMENT OF STEREOTACTIC AND RADIATION NEUROSURGERY

Head of Department Ass. Roman Liščák, M.D., Ph.D.

The clinical activity of the Department is focused on the non-invasive radiosurgical treatment of certain types of cerebral tumors, cerebral vascular malformations and functional diseases of the brain using **the Leksell gamma knife** as well as on stereotactic and functional neurosurgery. The outpatient clinic, in addition to providing consultation and follow-up care for the department's neurosurgical patients, also offers specialized ophthalmologic, neurophysiological and neurological care.

One of the most significant events of the past year was installation of a new Leksell gamma knife replacing in November 2009 the old Leksell gamma knife that was in operation from 1992. The old gamma knife was used in total for 10 526 radiosurgical interventions which makes it historically the most fully used gamma knife in the world. Thus the project initiated by the Charta '77 Foundation may be considered as a phenomenal success. The latest model of the Leksell gamma knife, named Perfexion, extends the range of the treated indications and allows radiosurgical interventions in the region of the head and neck which is important particularly in the treatment of metastatic cancer. It provides patients with a much higher safety, accuracy and comfort of the treatment.

The number of patients treated in the department reached 856 in 2009. The total number of surgical interventions performed in the department was 1 027 (including 856 Leksell gamma knife irradiations and 171 other surgical interventions). Neurostimulators to treat movement disorders were implanted and re-implanted in 27 patients. The Department still retained a small percentage of Slovak patients (33 patients in 2009) as part of its overall mix. Also, as has become traditional, among the patients irradiated by the Leksell gamma knife in 2009 were patients from Ukraine, who were offered this treatment free under the terms of a tripartite agreement between the Na Homolce Hospital, the Charta '77 Foundation and Ukraine (4 pediatric patients) or under the same conditions as Czech nationals (6 adult patients). Another numerous group included 22 patients from Poland.

Internal grant projects in cooperation with the Eye Clinic of the Střešovice Central Military Hospital, supported by the Elekta company, continued in 2009 only in the form of ophthalmologic follow-up checks. The projects were focused on the treatment of early stages of glaucoma by Leksell gamma knife and the influence of Leksell gamma knife irradiation on the progress of age-influenced macular

NEUROLOGICAL-NEUROSURGICAL PROGRAM (NEUROPROGRAM)

The clinical activity of the Department is focused on the non-invasive radiosurgical treatment of certain types of cerebral tumors, cerebral vascular malformations and functional diseases of the brain using **the Leksell gamma knife** as well as on stereotactic and functional neurosurgery.

degeneration. No additional patients were included in the study due to its termination in 2010.

In May 2009, the Department organized a one-day seminar on the occasion of 10 000 operations performed by the Leksell gamma knife that was attended by almost 200 neurologists from all over the Czech Republic. The meeting was a significant social event that was addressed by a video greeting of the former president Václav Havel and in person by the ambassadress of the Kingdom of Sweden.

The Department of Stereotactic and Radiation Neurosurgery is the only center of its kind in the Czech Republic and the East European region. The quality of its work and the range of its experience have ranked it among the prominent centers of its type worldwide.

In 2009, physicians of the Department were involved in undergraduate teaching for 1st and 3rd Faculties of Medicine of Charles University and in postgraduate teaching within the Institute for Postgraduate Studies.

In 2009, the Department of Stereotactic and Radiation Neurosurgery participated in two grant projects.

Basic data

Number of beds	0
- Day care	8
Number of physicians	6
Number of supervised medical staff, technical and administrative staff and X-ray assistants	6
Number of general nursing staff	13
Inpatient ward	
Number of admissions	736
Number of surgeries by Leksell gamma knife	856
Number of other stereotactic operations	171
Average length of stay (in days)	1,37
Outpatient clinic	
Number of outpatient consultations	2 115
Number of EMG examinations	59
Eye clinic	58
Follow-up examination	1 882
Number of neurostimulators implanted	27

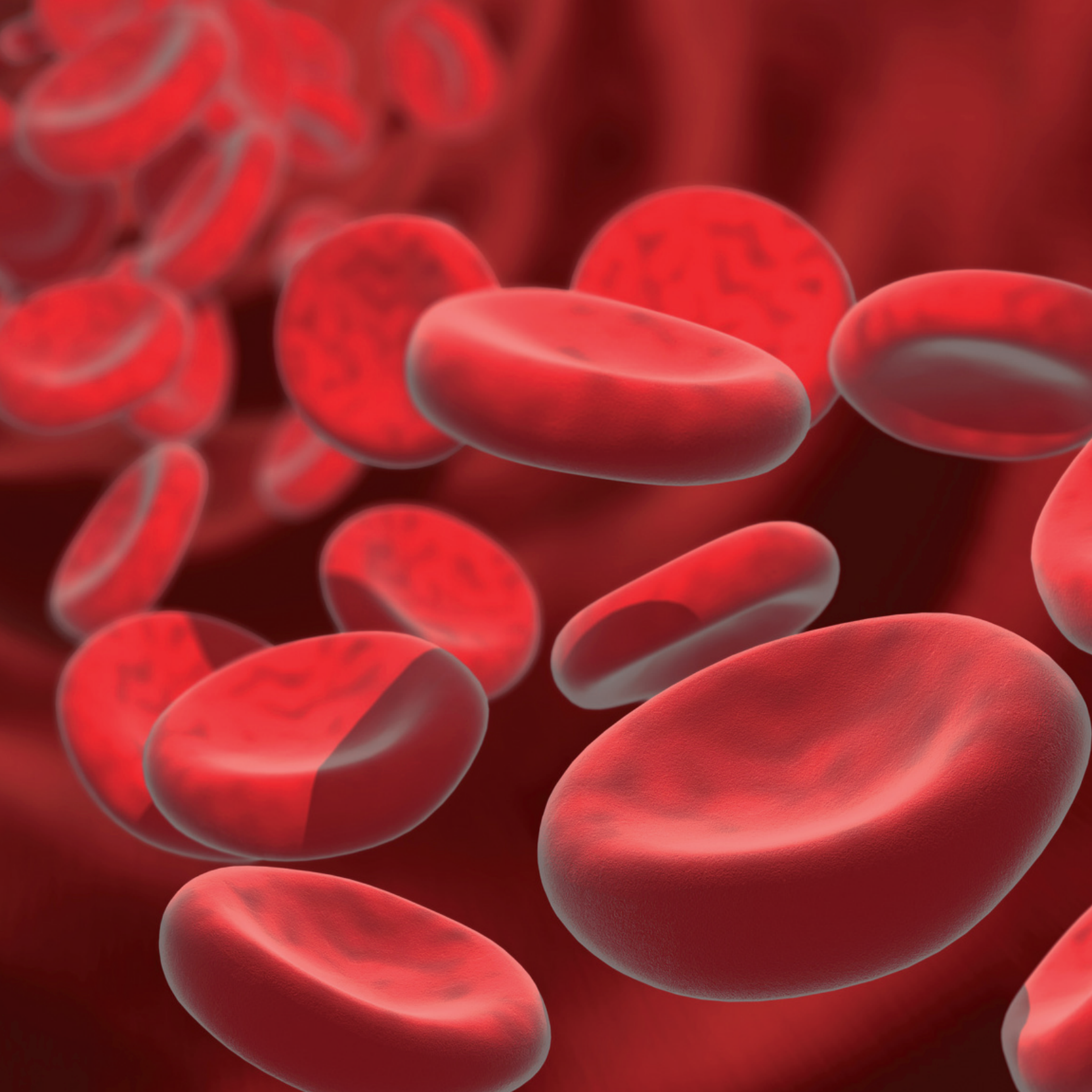
NEUROLOGICAL-NEUROSURGICAL PROGRAM (NEUROPROGRAM)

Number of patients treated by Leksell gamma knife

2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
566	735	781	803	856	798	802	819	832	856

Radiosurgical treatment by Leksell gamma knife broken down by individual diagnoses

	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
Malignant tumors of the brain	34 %	30 %	31 %	33 %	32 %	30 %	26 %	34 %	33,8 %	33,3%
Benign tumors of the brain	41 %	34 %	37 %	39 %	36 %	37 %	45 %	40 %	39 %	39,7%
Functional diseases of the brain	14 %	16 %	14 %	10 %	12 %	14 %	12 %	12 %	14,7 %	13%
Vascular malformations of the brain	11 %	9 %	9 %	9 %	10 %	11 %	10 %	10,5 %	8,7 %	8,8%
Eye indications		11 %	9 %	9 %	11 %	8 %	7 %	3,5 %	3,8 %	5,2%



CARDIOVASCULAR PROGRAM

It covers the full range of preventive, diagnostic and therapeutic methods for patients with diseases of the heart and blood vessels, or with a high risk of incurring these diseases.

CARDIOVASCULAR PROGRAM

DEPARTMENT OF CARDIOLOGY

Head of Department Ass. Prof. Miloš Táborský, M.D., Ph.D., FESC, MBA (1. 1. 2009 – 22. 4. 2009)
Ass. Prof. Petr Neužil, M.D., Ph.D., FESC (authorized to head the Department starting from 23. 4. 2009)

The clinical activities of the department cover the full range of preventive, diagnostic and therapeutic methods for patients with diseases of the heart and blood vessels, or with a high risk of incurring these diseases. Similarly as in previous years, the Department provided full coverage of several individual specialized areas in 2009.

Acute cardiology along with its coronary unit provides full cardiologic intensive care to patients suffering from acute diseases of the heart in the whole range of this specialization. The Department has adequate equipment for monitoring, support or substitution of essential vital functions. In the course of 2009, therapeutic procedures were complemented by the method of puncture tracheostomy; the method of endovascular monitoring of body temperature was extended, and the unique program of a short-time use of extracorporeal support of circulation for patients in cardiogenic shock and support in coronary and non-coronary interventions associated with certain risk continued.

Intervention cardiology includes the catheterization laboratory that deals with diagnostics of diseases of the coronary arteries, including therapeutic interventions, and the multifunctional catheterization center. In 2009, the catheterization laboratory performed 2 835 catheterizations and 1 180 implantation of stents, which is a growing trend as compared to 2008. In addition, it introduced a routine use of catheterization approach through the radial artery, which reduces the incidence of complications after the intervention and the period of the patient's immobilization. A completely new method within the Czech Republic was performed by the Department in 2009, namely laser atherectomy of coronary arteries offering the possibility to treat incurable patients by the existing conventional methods. As one of the first in Europe, the catheterization labora-

tory introduced in the past year a new type of occluder in interventions for congenital heart diseases and developed a program of percutaneous coronary interventions in the circulation support by different types of heart supports.

Intervention cardiology also covers **cardiac electrophysiology**, and in particular the diagnostics and treatment of cardiac rhythm disorders. For some time now, the Na Homolce Hospital has been one of the largest European centers specializing in this field. Following the trend of 2008, the multifunctional catheterization center increased the total number of ablations (768) with a predominance of complex interventions (catheter ablation for atrial fibrillation - 236). In 2009, the Na Homolce Hospital ranked first in the Czech Republic in terms of the total number of ablations performed. Balloon cryoablation became a routine method to treat the paroxysmal atrial fibrillation (87). In 2009, the Department also started to use successfully dynaCT rotational angiography with the possibility of 3D imaging of the left ventricle prior to ablation. In terms of the number of implantations of cardiostimulators and defibrillators, the Department is among the biggest centers in Europe and within the Czech Republic it is the center with the highest number of these implantations (1253 in the last year). The Department specializes in implantation of defibrillators and cardiac resynchronization therapy. In 2009, a total of 22 occluders of the auricle of the left ventricle (Watchman) were implanted within the ASAP and EVOLVE study, that serve to prevent thromboembolism in patients with atrial fibrillation. In 2009, the Department continued to focus on the increasing use of robot-assisted technologies in intervention cardiology, which ranks the Department of Cardiology of the Na Homolce Hospital among the most advanced centers in the field of electrophysiology both in Europe and in the world. The new methods introduced in 2009 included:

CARDIOVASCULAR PROGRAM

The clinical activities of the department cover the full range of preventive, diagnostic and therapeutic methods for patients with diseases of the heart and blood vessels, or with a high risk of incurring these diseases. Similarly as in previous years, the Department provided full coverage of several individual specialized areas in 2009.

- | Radiofrequency ablation of atrial flutter with direct visualization of the ablation lesion with an ultrathin endoscope
- | Ablation Frontiers – ablation by means of spiral catheter using RF energy
- | DynaCT
- | Extraction of stimulation and defibrillation electrodes by means of laser extraction system
- | The Experimental laboratory made tests of PulseCath and Cardio Robotics mechanical support

Non-invasive cardiology continued to offer patients a wide range of diagnostics of cardiovascular diseases during this period, including ultrasound, electrocardiography stress tests and echocardiograms, as well as long-term monitoring of cardiac rhythm and blood pressure, among others. In 2009, the number of echocardiographic examinations increased. To reflect this tendency, an apparatus was acquired as a new platform for 3D echocardiography. In the period under review the Department also started to prepare for accreditation in stress echocardiography granted by EAE (European Association of Echocardiography).

Clinical cardiology traditionally covered diagnostics and treatment of cardiovascular diseases both in hospital wards as well as in specialized outpatient clinics, and participated in providing the final treatment and physiotherapy for acute conditions and in the treatment of chronic diseases of the circulatory system. The total number of 11 300 patients were treated in the outpatient clinics in 2009.

Department of standard cardiology was provided with additional beds for intermediate care.

The specialized Heart Failure Unit, which offers continuous follow-up of patients with heart failure and care for patients at a less advanced stage of the disease, monitored a total of 1, 773 patients during 2009. In addition, a program of multidisciplinary care for patients with heart failure was introduced.

The specialized unit for treatment of arterial hypertension examined in total 1, 570 patients.

In 2009, the Department of Cardiology organized training of physicians from the European Union in permanent cardiostimulation.

In 2009, physicians of the Department were involved in undergraduate teaching for 1st Faculty of Medicine of Charles University.

In 2009, the Department of Cardiology continued its activity in two international multicentric studies under the grant of the National Institute of Health (NIH), BARI 2D and FREEDOM. The results of the BARI 2D study, where the Na Homolce Hospital took part as the only European center, were presented in June 2009 at the congress of the American Diabetes Association (ADA). In the same year the Department of Cardiology participated in another 16 clinical studies.

Basic data

Mortality 2000-2009	1,1%
Average duration of care (in days)	2,98
Number of days of care	15 080
Bed capacity utilisation in %	81,62%

CARDIOVASCULAR PROGRAM

Basic data

Number of beds	
- Standard	30
- Intermediate	4
- Intensive	18
Daycare clinic	5
Number of physicians	28
Number of general nursing staff	119
Number of outpatient examinations	35 273
Number of admissions	5 052
Number of days of treatment	15 080
- Standard	9 530
- Intensive	5 550
Bed occupancy rate [%]	81,6
- Standard	79,2
- Intensive	86
Average length of stay [days]	2,98

Specialized interventions – angiography center

Number of catheterizations	2 835
Coronarography (SKG)	2 633
Ventriculography (LVG)	883
Bilateral cardiac catheterization	241
Pulmonary artery angiography	8
Right-side angiocardiography	4
Bulbus aortography	215
Percutaneous Coronary Intervention (PCI)	961
Direct angioplasty PCI	289
Stents:	
- Number of patients	844
- Number of stents	1 180
Alcohol septal ablation	7
Occlusion DSS/PFO	11
Enhanced external counterpulsation	16
Pericardial puncture	1
Mortality in connection with the intervention	0,1%

CARDIOVASCULAR PROGRAM

Multifunctional catheterization center

Total number of interventions	1 253
Primary implantation and exchange of pacemakers	761
Primary implantation and exchange of ICDs	492
Implantation of subcutaneous recorder	68
Electrophysiology	
Ablations, total	768
Ablation of atrial fibrillation	236
Ablation of ventricular tachycardia	108
Other	424

Coronary unit

Total number of admissions	860
Outpatient electrical cardioversions	252
Acute coronary syndrome	442
Acute heart failure without ACS	168
Pulmonary embolism	31
Average length of stay (in days)	3
Mortality, total	3,9%

Outpatient clinic

General cardiology	6 025
Pacemakers	821
Angiology	1 189
Heart failure outpatient clinic	1 773
High blood pressure outpatient clinic	1 570

Non-invasive cardiology

Echocardiography	7 203
Esophagus examination	647
Dobutamin load	4
Total	7 854
Angiology examinations	2 847
ECG stress test	1 041
Holter EKG + Recollect	1 794
24-hour TK monitor	1 630
Tilt test	60
Spiroergometry	8

CARDIOVASCULAR PROGRAM

DEPARTMENT OF VASCULAR SURGERY

Head of Department Petr Štádler, M.D., Ph.D.

The department deals with surgical and angioradiological invasive diagnostics and treatment of diseases of the vascular system, primarily the narrowing or complete occlusion of the blood vessels as a result of atherosclerosis, and also with the injuries of arterial and vascular system except for coronary arteries, ascending aorta and the aortic arch. It is the only center of its type, with nationwide coverage of complex vasculo-surgical problems, ranging from radical replacement of the thoraco-abdominal aorta to palliative interventions such as radiofrequency sympathectomy. The surgery is focused on minimally invasive approaches using endovascular and robot-assisted methods. The department provides 24-hour emergency surgical care for all acute vasculo-surgical conditions.

In 2009, the range of surgical interventions covered **operations on branch arteries of the aortic arch, operations on the thoracic and abdominal aorta including aneurysms, reconstruction of arteries supplying abdominal and retroperitoneal organs, arteries serving the lower limbs, as well as surgery to treat varicose veins and unique transplantations of vascular grafts in the treatment of infection of vascular prostheses.** A significant growth was recorded in 2009 in the number of operations on the thoracic and abdominal aorta where the surgical strategy of the treatment of thoracic and thoracoabdominal aneurysms was adjusted. One of the most numerous groups was traditionally the group of patients with ischemic disease of the lower limbs and the patients with narrowing of arteries supplying blood to the brain. Miniinvasive medical interventions performed in the department included thoracic sympathectomies by

thoroscopic method, laparoscopic lumbar sympathectomies, endoscopic operations of the varicose veins, operations of abdominal aorta from reduced surgical approaches, so-called minilaparotomies, and particularly robot-assisted vascular surgery.

In 2009, the vascular surgery at Na Homolce Hospital further fostered its **worldwide leading position in the area of robot-assisted vascular surgery.** Robot-assisted operation of the splenic artery aneurysm performed in this Department had a world premiere here. By the end of 2009, the Department performed 167 robotic vascular interventions which is an outstanding achievement in this field. Many robotic operations performed in the Department of Vascular Surgery of the Na Homolce Hospital had a world premiere here, and our experience with robot-assisted vascular surgery has been well received by the professional public at home, as well as abroad, particularly in the USA and Asia.

Endovascular surgery represents another significant area of the department's activities that focuses on implantations of stentgrafts in the treatment of abdominal aneurysms or thoracic aorta. Implantation of stentgrafts, perioperative angiography or intraoperative angioplasties are performed as a standard in cooperation with the Department of Radiodiagnostics of the Na Homolce Hospital. A specialized team of physicians was established for this purpose.

The Department of Vascular Surgery serves as a training center in vascular surgery for postgraduate studies at the Institute for Post-

CARDIOVASCULAR PROGRAM

The department deals with surgical and angioradiological invasive diagnostics and treatment of diseases of the vascular system, primarily the narrowing or complete occlusion of the blood vessels as a result of atherosclerosis.

graduate Studies. It also functions as a specialized consultancy for serious and complicated angiosurgical cases.

In 2009, physicians of the Department were involved in undergraduate teaching for 1st and 2nd Faculties of Medicine of Charles University and in postgraduate teaching in the field of vascular surgery for the Institute for Postgraduate Studies and robot-assisted surgery for the European Institute of Telesurgery.

Basic data

Number of beds	61
- Standard	36
- Intensive	12
- Intermediate	13
Number of physicians	18
Number of general nursing staff	108
Number of outpatient examinations	11 911
Number of admissions	2 120
Number of days of treatment	16 368
Bed occupancy rate (as a %)	83,94
Average length of stay (in days)	7,72
Mortality	2,18%

Total number of operations

2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
1 345	1 349	1 552	1 573	1 625	1 410	1 585	936	906	1 469

Breakdown of vascular and general surgical interventions

Thoracic aneurysm	24
Abdominal aneurysm	166
Aortofemoral reconstructions	32
Pelvic reconstruction	38
Extraanatomic reconstruction in aortoiliac area	30
Operations on branches of the aortic arch	237
Proximal femoropopliteal reconstruction	71
Reconstructions of arteries supplying the limbs	119
Operations on varicose veins	177
Transplantation of vascular allografts	10
Laparoscopic-robotic reconstructions	27
Thoracic sympathectomy – thorascopic method	12

CARDIOVASCULAR PROGRAM

DEPARTMENT OF CARDIAC SURGERY

Head of Department Štěpán Černý, M.D., Ph.D.

Department of Cardiac Surgery of the Na Homolce Hospital is currently the third largest center of cardiac surgery in the Czech Republic. It deals with complex surgical treatment of diseases affecting the heart and the major endothoracic vessels. Its activities also cover outpatient monitoring of selected groups of patients before and after cardiac surgery.

In the course of 2009, 844 cardiosurgical interventions were performed in the Department which is approximately a 4% increase as compared to 2008.

In 2009, the range of cardiosurgical operations reflected a clear tendency of the Department to specialize **in valvular surgery** that accounted for 50.7% of the total number of operations. The program of surgical maintenance of the mitral valves and reconstruction of the left ventricle was further developed, while the ratio of mitral valvuloplasty in the total number of mitral interventions again exceeded 70%. The Department continued to develop also the program of miniinvasive operations of valves within which 80 patients were operated on from 2008.

The number of operations for **ischemic heart disease** accounted for 34.6% of the total number of operations in the period under review.

In the period under review, the Department worked in collaboration with the Department of Cardiology on the successful development of **intraoperative cryoablations in patients with chronic atrial fibrillation (MAZE)** program, when 184 patients were treated using this method. As a result, the Na Homolce Hospital remains the center

performing the highest number of these interventions in the Czech Republic. In 2009, the Na Homolce Hospital was further developing the program of these interventions in isolated atrial fibrillation, using minimally invasive approach.

Working together with the Department of Vascular Surgery and the Department of Radiodiagnostics, the **interdisciplinary program of care for patients with complex disorders of the aortic arch**, primarily focusing on the endovascular treatment of these diseases, continued in 2009. Na Homolce Hospital is gradually becoming a center with the highest number of interventions performed on thoracic aorta in the Czech Republic.

In 2009, the **program of care for adult patients with congenital heart conditions** was further systematically developed. The program consists of a specialized outpatient clinic for adult congenital heart conditions and a separate operating theater and post-operative care, which is provided in the Department of Cardiac Surgery of Na Homolce Hospital, in collaboration with the pediatric Cardiocenter at Motol Teaching Hospital. In 2009, there were more than 400 of these patients operated on at the Na Homolce Hospital.

In 2009, **the da Vinci robotic operating system** continued to be used for cardiosurgical interventions. Certain procedures, for example the robot-assisted closure of the septum defect, became a routine intervention and the method of choice for the surgical treatment of diagnosed heart disorders. In the course of 2009, another operation was added to the range of robot-assisted surgery. The team of the

CARDIOVASCULAR PROGRAM

Department of Cardiac Surgery of the Na Homolce Hospital is currently the third largest center of cardiac surgery in the Czech Republic.

Department of Cardiac Surgery of the Na Homolce Hospital was the first in the Czech Republic to perform a completely robotized mini MAZE cryoablation.

Basic data

Number of beds	34
Standard	14
Intensive	10
Semiintensive	10
Number of physicians	15
Number of general nursing staff	95
Number of outpatient examinations	4 085
Number of admissions	944
Number of days of treatment	10 426
Bed occupancy rate (as a %)	85,04
Average length of stay (in days)	11,04

Surgical interventions

Isolated aortocoronary reconstructions	292
Combined aortocoronary reconstructions (EACI, MAZE etc.)	36
Coronary valve replacement/ reconstruction	428
Isolated operations on the ascending aorta and the aortic arch	33
Epicardial stimulator electrode implants	23
Other (myxoma, pericardectomy, PM extraction)	32
Total	844
MAZE operations (combined with ACB and valvular surgery)	184
Total thoracic aorta operations (combined with other interventions)	59
Robot-assisted interventions	11
Acute and emergency operations	165
Planned operations	679

CARDIOVASCULAR PROGRAM

DEPARTMENT OF CARDIOANESTHESIOLOGY

Head of Department Pavel Jehlička, M.D.

Department of Cardioanesthesiology was established as a separate unit in 2008 as part of the Cardiocenter of the Na Homolce Hospital. Its core activities include two basic fields, namely **anesthesiologic care for the departments of cardiosurgery and cardiology and intensive care for the cardiosurgical Unit of postoperative and resuscitation care.**

In the field of anesthesia, it provides care of patients who undergo cardiosurgical operations with or without extracorporeal support of circulation, cardiosurgical robot-assisted operations or cardiosurgical operations with minimally invasive approach. In cardiological patients, it ensures anesthesia in complicated mapping of the heart in arrhythmology, anesthesia in extraction of stimulation systems and anesthesia for electrical cardioversions.

In the field of intensive care it ensures operation of the cardiosurgical Unit of postoperative and resuscitation care, closely cooperates also with the cardiosurgical Unit of intermediate care. At the same time it provides consultancy within the Cardiocenter scope in other units of intensive cardiological care. Together with the Department of Cardiology and Department of Biomedical Engineering it is involved in the programme of extracorporeal support of circulation in patients in cardiogenic shock.

As the only department in the Czech Republic, the Department of Cardioanesthesiology ensures anesthesia in robot-assisted operations within cardiosurgery and anesthesia in operations of adult patients with congenital heart conditions.

CARDIOVASCULAR PROGRAM

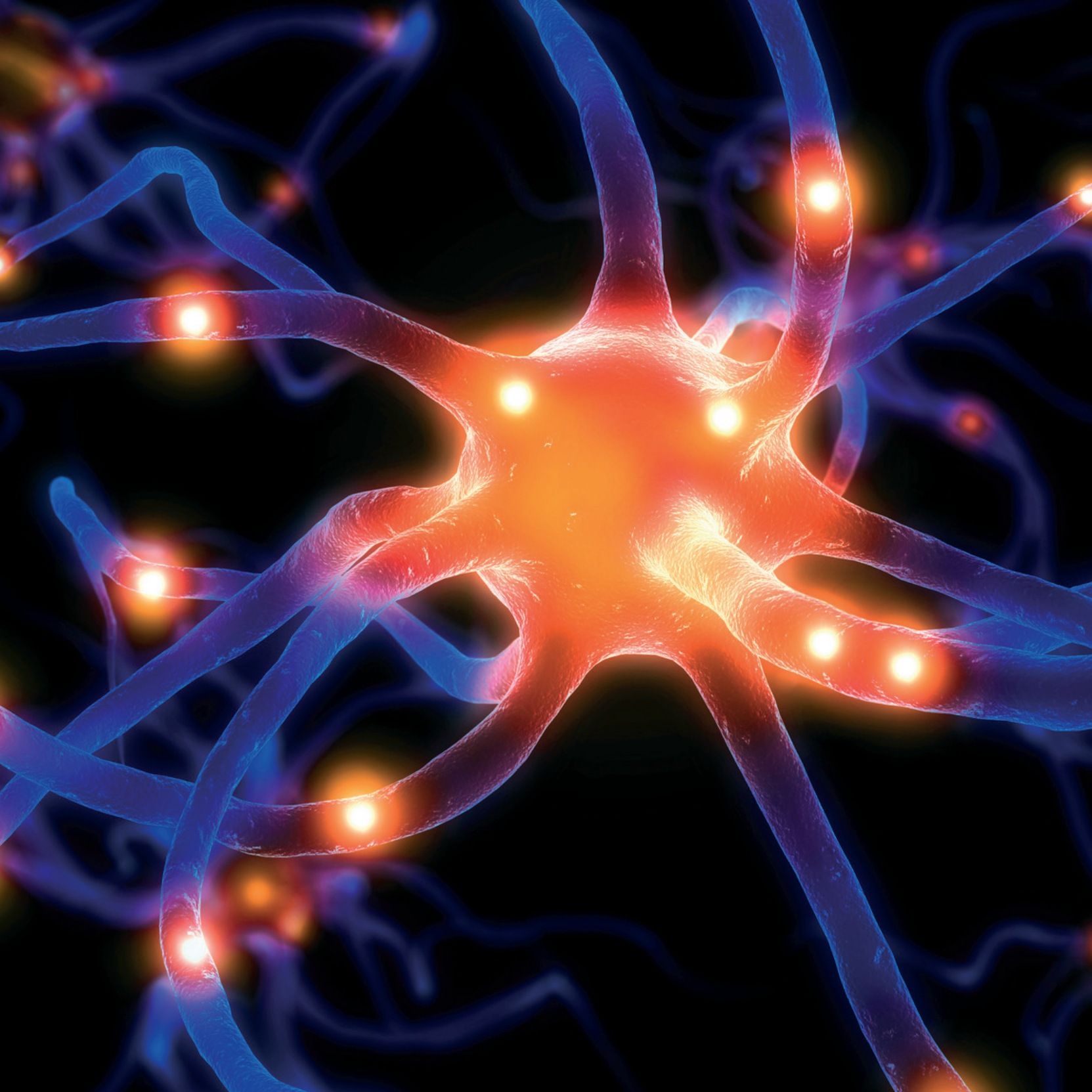
Its core activities include two basic fields, namely anesthesiologic care for the departments of cardiosurgery and cardiology and intensive care for the cardiosurgical Unit of postoperative and resuscitation care.

Basic data

Number of physicians	7
Number of general nursing staff	8

Total number of anesthetics administered

Cardiosurgery	912
Cardiology	316
Operations lasting more than 2 hours	86
Patients older than 65 years	712



GENERAL MEDICAL CARE PROGRAM

This program offer a complete range of modern diagnostic and therapeutic methods for diseases related to internal medicine and general surgery, with a focus on minimally invasive surgery.

GENERAL MEDICAL CARE PROGRAM

DEPARTMENT OF INTERNAL MEDICINE

Head of Department Robert Wohl, M.D.

The Department's activities include ensuring preventive, diagnostic and conservative treatment for diseases of internal nature, with distinct above-regional sub-specializations in **gastroenterology and pneumology**.

One of the traditional activities of the Department includes care for **patients with the short bowel syndrome** and ensuring **long-term parenteral nutrition**, including treatment of complications (septic, thrombotic) inevitably associated with this therapy. In 2009, the Department started to use routinely the bedside sonography and interventions under the ultrasound control (central cannulation, dg/evacuation puncture etc.).

The outpatient services also comprise diabetology, endocrinology and acute treatment clinics that serve for the treatment of outpatients requiring acute treatment, administration of infusions, including planned hemosubstitutions, and diagnostic and therapeutic interventions.

Patients suffering from acute internal diseases are treated in **the intensive care unit**, that was equipped with a new monitoring system in 2009.

In 2009, the Department continued to provide the necessary clinical back-up to the key parts of the Na Homolce Hospital's Cardiovascular program and Neuroprogram. The intensive care unit focused on internally polymorbid patients, and particularly on patients suffering from complicated infections.

In the area of gastroenterology, the double balloon enteroscopy was introduced into routine practice in the period under review. The unit was equipped with a gastroscope and a colonoscope with NBI (narrow band imaging) allowing more precise diagnostics of diseases of the digestive tract, and with an endosonograph with a surgical channel. **The Gastroenterologic unit** served as a center for biological treatment of unspecified intestinal inflammations.

The Department of Internal Medicine includes **the Pulmonary Endoscopy Center** with a nationwide coverage. It offers comprehensive bronchologic diagnostics including autofluorescent bronchoscopy, NBI (narrow band imaging) and endobronchial ultrasonography – unique in the Czech Republic. The range of Center's services also features rigid bronchoscopy under general anaesthesia, endobronchial rechannelling, electrocauterization and implantations of endobronchial stents. The pleuroscopy using semirigid videopleuroscope is also performed in the department, a unique method in the Czech Republic, which allows precise diagnostics and therapy of the pleural syndrome. The new diagnostic methods combined with the existing ones (such as PET-Center at the Department of Nuclear Medicine) provide exceptional opportunity for early diagnosis and staging of carcinoma of the bronchi in the Czech Republic. In 2009, the Center launched the program of bronchoscopic lung volume reduction in patients with severe emphysema by means of insertion of valves into bronchi. In 2010, this program will be supported by the General Health Insurance Company grant.

GENERAL MEDICAL CARE PROGRAM

The Department's activities include ensuring preventive, diagnostic and conservative treatment for diseases of internal nature, with distinct above-regional sub-specializations in gastroenterology and pneumology.

In 2009, physicians of the Department of Internal Medicine were involved in undergraduate teaching for 1st and 3rd Faculties of Medicine of Charles University as well as in postgraduate teaching. Also in 2009, the Department acted as a training center in the specialized field of "Artificial Nutrition and Metabolic Care".

Specialized interventions 2009

Gastroscopy	2 229
Colonoscopy	2 195
Endoscopic sonography	518
ERCP	483
Endoscopic papillosphincterotomy	273
PEG	25

Basic data

Number of beds	29
- Standard	21
- Intensive	8
Number of physicians	23
Number of general nursing staff	52
Number of outpatient examinations	28 644
internal medicine clinic	20 221
gastroenterological examinations	8 423
Flexible and autofluorescent bronchoscopy	1 213
Functional examination of lungs	3 277
Number of admissions	1 098
Number of days of treatment	8 448
Bed occupancy rate (as a %)	
- Standard	89,72
- Intensive	94,11
Average length of stay (in days)	
- Standard	7,68
- Intensive	7,53

GENERAL MEDICAL CARE PROGRAM

DEPARTMENT OF ONCOLOGY

Head of Department Martin Šafanda, M.D.

The Department of Clinical Oncology specializes in **the treatment of adult patients with malignant tumors**. Oncological treatment is divided into 4 key areas: gastroenterological program, mammo-logical program, urogynecological program and pneumooncological program.

With the exception of therapy by irradiation, antitumor therapies in all indications are performed in the department – adjuvant, neo-adjuvant and palliative. A team of specialists in the fields of radio-diagnostics, surgery, internal medicine, gynecology and pathology participate in the diagnostic process of the most frequent malignant tumors. The radiotherapy is performed in collaboration with Motol Teaching Hospital and Na Bulovce Teaching Hospital.

Na Homolce's Department of Oncology closely cooperates with the Comprehensive oncological center of the Motol Teaching Hospital.

Basic data

Number of physicians	4
Number of general nursing staff	5
Number of outpatient examinations	9 577
Number of cycles of chemotherapy	6 466

GENERAL MEDICAL CARE PROGRAM

DEPARTMENT OF GENERAL SURGERY

Head of Department Michal Toběrný, M.D.

The Department provides a wide range of services covering diagnostics and surgical treatment in the areas of **general surgery, orthopedics and urology, while the outpatient clinic also includes counseling centers for abdominal, gastroenterological and lung surgery and oncosurgery, as well as a counseling center for mammology, phlebology and bariatrics, an orthopedic outpatient clinic, a urological outpatient clinic and a clinic for minor surgical interventions.** The intensive care unit provides post-operative care for complicated and life-threatening conditions.

In the field of general surgery, as in previous years, abdominal and thoracic surgery was performed using minimally invasive methods in all areas of laparoscopic surgery, with emphasis on one-day surgery. Care continued to be provided in oncological surgery of the digestive tract, mammology and bariatric surgery (for morbid obesity). In 2009, the **surgical team** performed the standard range of interventions, primarily using the perioperational radiofrequency ablation method for the treatment of liver metastasis in colorectal carcinoma, as well as laparoscopic reconstructions of inguinal and frontal hernias, laparoscopic bariatric surgery, operations for anal prolapse and hemorrhoids using the Long method, and laparoscopic surgical interventions to treat the gastro-esophageal reflux disease. During the period under review, further development was achieved in the most demanding laparoscopic procedures on the colon, rectum and gastrointestinal tract using the harmonic scalpel. In 2009, the **da Vinci robotic operation system** was routinely used for different interventions.

Na Homolce Hospital's Department of Surgery is a national training center for anal prolapse surgery and the Long method of treatment of hemorrhoids.

Orthopedic operations performed in 2009 comprised the total replacement of joints, including shoulder and ankle joints, as well as reimplantation of joints. The orthopedic navigational system was routinely used for surgery on large joints. Na Homolce Hospital's Department of Surgery is a reference center for the Orthopilot navigation system used in total joint replacement.

Urological operations included, as in previous years, open and endoscopic surgery on the urinary system, including urological oncosurgery, using minimally invasive laparoscopic, cystoscopic and ureterorenoscopic surgical techniques. In 2009, **da Vinci robotic operation system** was routinely used during urologic surgical procedures (in particular for radical prostatectomies, pyeloplasty and kidney resections).

In 2009, physicians of the Department of Surgery were involved in undergraduate teaching for 3rd Faculty of Medicine as well as in postgraduate teaching within the Institute for Postgraduate Studies.

GENERAL MEDICAL CARE PROGRAM

Basic data

Number of beds	31
- Standard	16
- Intensive	15
Number of physicians	20
Number of general nursing staff	55
Number of outpatient examinations	35 476
Number of admissions	2 314
Number of surgical interventions	2 212
Minor outpatient interventions	1 428
Number of days of treatment	8 908
Bed occupancy rate (as a %)	82,97
Average length of stay (in days)	3,85
Mortalities	7

Počet ambulantních ošetření

Surgery	15 546
Orthopedics	10 283
Urology	9 647
Total	35 476

Number of admissions by diagnosis

Neoplasms	378
Diseases of the digestive system	807
Orthopedic disorders	612
Urological disorders	120
Benign tumors	93
Morbid obesity	41
Other conditions	250

Number of surgical interventions

Surgery	1 300
Urology	157
Orthopedics	625
Other conditions	130

GENERAL MEDICAL CARE PROGRAM

DEPARTMENT OF GYNECOLOGY AND MINIMALLY INVASIVE SURGERY

Head of Department Petr Popelka, M.D.

The Department's activities cover diagnosis and surgical treatment of gynecological diseases. The complete spectrum of pelvic and gynecological surgery was concentrated in four clinical programs in 2009: **oncogynecological surgery, urogynecological surgery, complex diagnostics and endometriosis surgery and general gynecologic surgery.**

Oncological and oncolaparoscopic surgery includes classical, laparoscopic, laparoscopically assisted and laparovaginal surgery for tumors of the vulva, cervix, endometrium and ovaries and a follow-up care for patients operated on and receiving oncological treatment in specialized centers. The Department's modern operating methods and state-of-the-art equipment have significantly contributed to improvements in the precision and speed of oncolaparoscopic interventions. Part of the Department's activities is a unique program of complex laparoscopic operation of cervical carcinoma introduced in the Department (and the Czech Republic) in 2007.

Urogynecologic surgery covers both diagnostics and surgical and conservative treatment of incontinence and pelvic floor disorders, where emphasis is placed on laparoscopic solution to these problems. Surgical procedures include the latest trends in the use of spe-

cial reticulate implants and put emphasis on comprehensive solution of the given problems while observing the rules of minimal invasive interventions. In total 320 patients with the above mentioned problems were operated on in the Department.

Complex diagnostics and endometriosis surgery program offers patients from the whole Czech Republic a comprehensive treatment comprising radical laparoscopic operations, a predictive histological diagnosis of growth factors and subsequent hormonal therapy with a final check-up to verify its success. Na Homolce Hospital's Department of Gynecology is one of the most experienced centers in the Czech Republic to perform radical operations of retroperitoneal endometriosis. In 2009, the Department performed 25 interventions and the results were published in specialized journals.

General gynecological surgery offers surgical treatment of infertility, myomatosis, adnexal tumors and cysts; it deals with postoperative adhesions, chronic pelvic pain, inflammation and congenital development disorders of the uterus, particularly syndromes of uterine and vaginal aplasia. Hysteroscopic surgery includes diagnostic and surgical endoscopies of the uterine cavity.

GENERAL MEDICAL CARE PROGRAM

The department's activities cover diagnosis and surgical treatment of gynecological diseases.

Overall, the number of surgical interventions totaled 2, 019 operations in 2009, of this **95%**, including oncological interventions, **were performed by minimally invasive methods.**

The Department of Gynecology and Minimally Invasive Surgery is one of the twelve centers in the Czech Republic and the seat of the Secretariat and Board of Trustees of the Czech Association of Gynecological Endoscopy and Pelvic Surgery (CSGE).

Basic data

Number of beds	26
- Standard	20
- Intensive	6
Number of physicians	8
Number of general nursing staff	18
Number of outpatient examinations	18 912
Number of admissions	2 090
Number of surgical interventions	2 019
Number of days of treatment	6 527
Bed occupancy rate (as a %)	78,75
Average length of stay (in days)	3,12

GENERAL MEDICAL CARE PROGRAM

DEPARTMENT OF ENT / HEAD AND NECK SURGERY

Head of Department Jan Paska, M.D.

The Department specializes in diagnostics, and conservative and surgical treatment of diseases of the ears, nose and throat. Surgical interventions in 2009 included so called **one-day surgery**, as well as a **complete range of head and neck surgery**, concentrating on comprehensive oncological ENT surgery, cophosurgical interventions, surgery to the nose and paranasal cavities including endoscopic interventions, complex surgery on the thyroid gland, adenotomy, as well as reconstructive surgery in the area of head and neck, microsurgery on the larynx, operations to the soft tissues of the head and neck and surgery for injuries to the facial bones. Surgery to the base skull was developed in collaboration with the Department of Neurosurgery.

The **Program of comprehensive treatment of the lower jaw** continued in 2009 and a jaw clinic began routine operations. The therapy for diseases of the lower jaw requires the widest possible range of treatment options – from conservative treatment methods, through minimally invasive methods (arthrocentesis under local anesthesia, initial arthroscopic surgery) to traditional surgery of the jaw (temporomandibular) joint including its total replacement.

In the field of **thyroid surgery** the Department followed the world trend and was the first in the Czech Republic to introduce a miniinvasive form of removal of thyroid by the MIVAT method.

The Department's outpatient clinic again provided a comprehensive range of services throughout 2009, including specialized counseling in the fields of **oncology, otoneurology, cophosurgery, otoprosthesis, a rhinopathy clinic, a clinic for thyroid disorders, a clinic for corrective nose surgery, a foniatic outpatient clinic and a joint clinic**. A new specialized clinic of care for salivary glands was opened which offers a unique diagnostic method of endoscopy of salivary gland ducts. There was a significant expansion of the services provided by **the sleep and snoring disorders clinic**, particularly in collaboration with the Department of Neurology and sleep disorders laboratories. The department also has a **specialized pediatric** practice. Part of the care is also **aesthetic program** which includes primarily interventions on external ears, eye lids and laser operations.

In 2009, the Department of ENT/ Head and Neck Surgery organized a traditional specialized international workshop on diseases of thyroid and salivary glands with live broadcast from the operating theater.

In 2009, physicians of the Department of NET /Head and Neck Surgery were involved in undergraduate teaching for 3rd Faculty of Medicine and College of Education of Charles University.

GENERAL MEDICAL CARE PROGRAM

Basic data

Počet lůžek	11
- Standard	8
- Intensive	3
Number of physicians	10
Number of general nursing staff	18
Number of outpatient examinations	27 668
Number of admissions	1 026
Number of surgical interventions	1 280
Number of days of treatment	2 737
- Standard	1 808
- Intensive	929
Bed occupancy rate (as a %)	69,17
- Standard	62,78
- Intensive	86,26
Average length of stay (in days)	2,67
- Standard	1,14
- Intensive	1,61

Number of surgical interventions

Operations under local anesthesia	305
Operations under general anesthesia	809
Operations using tracheotomies	77
TEP/TMJ surgery	70
FESS	184

GENERAL MEDICAL CARE PROGRAM

EYE DEPARTMENT

Head of Department Petr Novák, M.D.

The eye department provides a wide range of interventions, both basic and special outpatient ophthalmologic examinations, **all surgical interventions on the anterior eye segment, primarily cataract surgery and cornea transplantation. The range of the care includes also glaucoma surgery, surgical treatment of post-injury conditions and operations of eyelids and the surrounding region.** Most operations are performed in the outpatient section, in case of cataract surgery more than 96% interventions. Surgical procedures are based on the advanced methods of eye microsurgery.

Special examinations include computer perimetry, autorefractometry, ultrasound examination and contactless tonometry. Special examinations are provided to outpatients and inpatients of the Na Homolce Hospital, as well as to patients from other hospitals, based on recommendations of ophthalmologists and neurologists.

In 2009, the Department extended the offer and added **commercial refractory interventions** – extraction of the lens with replacement by monofocal or multifocal implant and implantation of toric lenses.

Basic data

Number of physicians	6
Number of general nursing staff	6
Number of outpatient examinations	20 421
Total number of patients treated	6 056
Total number of operations	1 276
Cataract surgery	1 109
Commercial refraction interventions	70
Cornea transplantation	42
Surgical correction of astigmatism	55

GENERAL MEDICAL CARE PROGRAM

DEPARTMENT OF ANESTHESIOLOGY AND RESUSCITATION (AR)

Head of Department Michael Stern, M.D.

The Department of Anesthesiology and Resuscitation provides comprehensive care for patients during surgery as well as in the periods prior to and following their operations, the administration of general anesthesia and the more demanding types of local anesthesia. The Resuscitation unit provides comprehensive diagnostics and treatment of patients whose general state of health is affected by disorders to their basic vital functions, so severe as to be life-threatening and who require the highest level of medical care. The overwhelming majority of cases are patients with injuries to the brain and cranium. The facilities provided by the center include a hyperbaric chamber offering the possibility of artificial pulmonary ventilation and other specialized methods of reanimation treatment. The pain management clinic deals with problems experienced by patients in chronic pain.

Basic data

Number of beds	8
Number of physicians	29
Number of general nursing staff	55
Number of admissions	152
Bed occupancy rate (as a %)	93,12
Average length of stay (in days)	19
Mortality (as a %)	28,3

Structure of units

- 1 resuscitation unit
- 2 postoperative unit of vascular surgery
- 5 central operating theaters
- 3 operating theaters for general surgery
- 2 operating theaters for gynecology
- 1 operating theatre for robotic surgery
- 8 other operating theaters and units
(ENT, stereotaxis, x-ray, dentistry, eye clinic,
NM-PET, GASTRO, bronchiology)
- 1 hyperbaric chamber

Overview of anesthetics administered

Number of patients anesthetized for interventions lasting longer than 2 hours	2 816
Number of local anesthetics	1 247
Number of patients over the age of 65 anesthetized	2 878
Number of anesthetics administered for acute interventions	884
Total number of anesthetics administered	9 157
Interventions in the pain clinic	619

GENERAL MEDICAL CARE PROGRAM

Other outpatient departments

DEPARTMENT OF ALLERGOLOGY AND CLINICAL IMMUNOLOGY

Head Ass. Prof. Vít Petrů, M.D., Ph.D.

The Department is part of the Center of Allergology and Clinical Immunology of the Na Homolce Hospital, that provides **complex therapeutic and preventive care to patients with asthma, allergy, immunity defects and other types of immunopathological disorders, including a wide range of clinical and laboratory examinations.** The Center has two departments: Department of Allergology and Clinical Immunology (pediatric outpatient section) and Department of Clinical Biochemistry, Hematology and Immunology (adult outpatient section and laboratory section).

Department of Allergology and Clinical Immunology provides complex outpatient services:

| **Pediatric outpatient section** focuses primarily on children suffering from bronchial asthma, allergic rhinitis, atopic eczema and repeated respiratory diseases.

| **Adult outpatient section** treats in addition to patients with bronchial asthma and allergies, also patients with primary and secondary immunodeficiencies. Physicians of this section provide consultancy also to other wards of the Na Homolce Hospital, with a focus on patients in intensive care units and patients with systemic autoimmune diseases.

Club of Patients with Allergy and Asthma (AA Homolka Club) continued to carry out its activities also in 2009. The Club is a member of the Association for the Assistance of Chronically Ill Children and has more than 100 members (families). For eleven years now, it has been associating families of allergic children, organizing educational lectures, publishing the bulletin "Motýlek" (Butterfly), distributing the journal "Allergy, asthma, bronchitis". Through its activities, the Club conduces to improvement of the quality of care for children suffering from allergy and asthma.

As part of the Sub-department of Allergology and Clinical Immunology of the Institute for Postgraduate Studies, the Center of Allergology and Clinical Immunology is also an accredited educational center for in-service training of physicians and other medical staff in the field of allergology and clinical immunology. Specialists of the Center are also involved in research and development and publication activities.

Basic data

Number of physicians	3
Number of general nursing staff	3
Number of outpatient examinations	12 153
Total number of patients treated	3 455

Number of examinations

Year	Number of patients	Number of examinations	Derma-tological tests testy	Spirometry	Allergen. vaccines
2005	2 733	10 086	24 991	3 925	534
2006	3 011	10 689	27 953	4 166	631
2007	3 208	11 753	26 573	4 268	738
2008	3 198	12 465	31 133	4 148	757
2009	3 455	12 153	31 018	4 908	530

GENERAL MEDICAL CARE PROGRAM

Other outpatient departments

PEDIATRIC DEPARTMENT

Head of Department Petr Žáček, M.D.

The Department focuses on diagnostics and treatment of children's diseases, postnatal care and provides services of a general practitioner for children and adolescents up to the age of 19 years. Specialized outpatient units offer pediatric endocrinology, gastroenterology, logopedics, nephrology, neurology, orthopaedics, pneumology and psychology.

In 2009, the neurological and orthopaedic outpatient unit further developed the already established program of neuroorthopaedic screening focused on neurological and orthopaedic observance of patients, primarily on diagnostics of musculoskeletal disorders – disorders of gait coordination, postural and neurologically conditioned defects and identification and treatment of idiopathic or compensation scolioses. The neurological outpatient unit also specializes in headache in children. In cooperation with other pediatric units, the endocrinology center deals with early detection of children with the diagnosis of intrauterine growth retardation and early diagnostics of juvenile thyreopathy. The psychological unit provided diagnostics consultancy of a clinical psychologist, crisis intervention and, if necessary, a long-term follow-up of the respective child. The logopedics unit continued to cooperate closely with the network of private pediatric outpatient clinics and primary outpatient logopedic centers. In the course of 2009, the Pediatric gastroenterological center launched its activities.

Basic data

Number of physicians	15
Number of general nursing staff	5
Number of outpatient examinations	28 521

GENERAL MEDICAL CARE PROGRAM

Other outpatient departments

DEPARTMENT OF DERMATOLOGY

Head of Department Richard Šuraň, M.D.

The Department provides therapeutic and preventive care in the field of dermatovenerology, including diagnostics and long-term follow-up of suspected tumor diseases.

In addition to the basic examination scope, the range of examinations include also phototherapy by a SUP lamp, electrocauterization, cryotherapy, sclerotherapy for varices, dermatoscopic examination of pigment formations, Doppler and photoplethysmographic examination of the vascular system of the limbs.

Basic data

Number of physicians	1
Number of general nursing staff	1
Number of outpatient examinations	6 572

GENERAL MEDICAL CARE PROGRAM

Other outpatient departments

DEPARTMENT OF DENTISTRY

Head of Department Petr Kolčava, M.D.

Stomatological care covers a full range of outpatient dental care, including prevention, treatment of acute cases and providing consultancy to other Hospital departments.

Basic data

Number of physicians	2
Number of general nursing staff	1
Number of outpatient examinations	10 593

GENERAL MEDICAL CARE PROGRAM

Other outpatient departments

DEPARTMENT OF PSYCHIATRY

Head of Department Jaroslava Skopová, M.D.

Department of Psychiatry is a specialized outpatient unit that is focused on diagnostics and therapeutic and preventive psychiatric care. It closely cooperates with a number of both outpatient and inpatient departments of psychiatry in Prague, indicated patients are referred to hospitalization.

Basic data

Number of physicians	1
Number of general nursing staff	1
Number of outpatient examinations	2 706

GENERAL MEDICAL CARE PROGRAM

Other outpatient departments

DEPARTMENT OF CLINICAL PSYCHOLOGY

Head of Department Martin Kořán, M.A., Ph.D.

The Department provides a wide range of **diagnostic, psychotherapeutic and consulting services** to inpatients and outpatients of the Na Homolce Hospital. Specialized psychological care includes preoperative psychological preparation of patients before complicated interventions, help in coping with psychological impact of the patients' diseases, psychological diagnostics focused on identification of intellect and mnemonic abilities or identification of personality psychopathology that rules out certain medical interventions.

In compliance with the clinical profile of the Na Homolce Hospital, the Department provides **specialized neuropsychological diagnostics and psychotherapeutic care to patients with neurological diseases, specialized psychological diagnostics and psychotherapeutic care to patients with cardiac and vascular diseases and within internal medicine, it offers psychotherapeutic care to bariatric patients, including obesitology consultancy and psychosomatic care.**

Additional services include **crisis intervention** in acute reactions to unfavourable diagnosis, **psychodiagnostics and psychotherapy of children** with different psychosomatic, behavioural and study problems or **psychological examination** of patients required by directives and regulations of the Ministry of Health and the General Health Insurance Company. Part of the care is also **psychosomatic and pain treatment consultancy.**

In 2009, the specialists of the Department were involved in undergraduate teaching at the College of Education of Charles University and postgraduate teaching for the Institute for Postgraduate Studies in the field of clinical psychology

Basic data

Number of psychologists	4
Number of psychological examinations	7 855

GENERAL MEDICAL CARE PROGRAM

Other outpatient departments

DEPARTMENT OF PHYSIOTHERAPY AND PHYSICAL MEDICINE

Head of Department Ivan Hadraba, M.D.

The Department provides a comprehensive diagnostic and therapeutic care to restore the physical abilities of patients. Diagnostic-therapeutic services are part of the clinical programs of the Na Homolce Hospital – the Neuroprogram, the Cardiovascular program and the General medical care program. The team of the Department comprises specialized physicians, physiotherapists, nurses and masseurs offering care to both the patients of the Hospital and other patients referred from other medical care facilities.

The range of services provided by the Department includes **diagnostics and treatment of functional disorders of the musculoskeletal apparatus, care after injuries and operations of the musculoskeletal apparatus, preoperative and postoperative care in spinal surgery, orthopaedic-prosthetic care, physiotherapy in the treatment of incontinence in women and men, diagnostics and treatment by computer kinesiology.** Traditional procedures include physiotherapy, hydrotherapy, electrotherapy, massages, lymphatic massages, peat wraps and gas injections.

Basic data

Number of physicians	4
Number of physiotherapists	26
Number of general nursing staff	5
Number of outpatient examinations	27 000
Number of therapeutic procedures	203 304

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

DEPARTMENT OF RADIODIAGNOSTICS

Head of Department Prof. Josef Vymazal, M.D., D.Sc.

During 2009, the Department continued to provide services to the Na Homolce Hospital, as well as to other healthcare facilities including those available around-the-clock. The scope of its activities included diagnostic examinations in all areas of radiodiagnostics with emphasis on diseases of the nervous, musculoskeletal and cardiovascular systems, as well as on vascular and non-vascular interventions.

The department continued to apply **vascular techniques** during the year under review, working closely with the vascular and cardiac surgery departments on a program to implant stents in aneurysms of the abdominal and thoracic aorta and the pelvic circulatory system, with the total number of interventions reaching 83. Na Homolce Hospital is thus ranked first in the Czech Republic for the number of implants performed. The department also further developed the program of endovascular neuroradiological interventions, namely the treatment of brain aneurysms by means of removable coils, where necessary, with the use of remodelling technique by means of stents. The department started to use new types of remodelling stents and stents with a denser weave that helps the blood to clot and to seal off the aneurysm. Also routinely used was a new two-component adhesive which offers more possibilities in the treatment of intracranial arteriovenous malformations as well as malformations in the region of the spinal canal.

The revascularization treatment for acute ischemic cerebrovascular diseases, based on acute occlusion of one of the main cerebral arteries, was extended by adding the technique involving mechanical re-

moval of the thrombus with the help of MERCI equipment and a new type of extraction device Penumbra, to the intraarterial thrombolysis. The two instrumentation sets are the only ones that acquired the FDA approval for clinical use. In 2009, the team of the Department of Radiodiagnostics introduced a procedure unique in the world, namely treatment of cerebrovascular diseases, based on acute occlusion of the deep venous system and sinuses by superselective catheterization directly in the deep cerebral veins with a subsequent local thrombolysis, ensuring patency of deep veins and sinuses.

A double-projection angiograph Axiom Artis serving, thanks to superior postprocessing and sophisticated road-mapping, especially for neuroradiological examinations, expands the therapeutic possibilities of vascular interventions in the area of head, spine and other parts of the body.

In the area of **non-vascular methods** the number further grew of performed percutaneous vertebroplasty and kyphoplasty procedures in the treatment of compression fractures of the vertebrae due to osteoporosis or from other causes, in 2009. In this segment of interventional radiology, Na Homolce Hospital is the leading Czech medical facility. A new method was introduced, namely kyphoplasty with insertion of a stent into the vertebra.

In the area of **magnetic resonance imaging**, the Department launched in 2009 the program of intraoperative MR imaging using a device newly installed in the complex of operating theaters for neurosurgery. The use of the device also for routine examinations during periods when it is not used in the operating theaters redu-

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

During 2009, the Department continued to provide services to the Na Homolce Hospital, as well as to other healthcare facilities including those available around-the-clock.

ced the waiting times for examinations and increased their number. In the period under review, the Department applied routinely MRI spectroscopic examinations by means of both SVS and CSI in the region of the brain as well as in other parts of the body (prostate, in particular), diffusion imaging and the technique of diffusion tensor and tractography of white matter. At the same time it extended the program of cardiac MRI examination where the newly implemented phase-contrast sequences allow imaging and quantification of the blood flow which is important mainly in examinations of valvular and cardiac shunt defects.

During the year it further developed the BOLD functional MR imaging for neuronavigation and deep brain stimulation.

Mammography clinic is part of the network of accredited clinics. At the beginning of 2009, a new complex was launched for mammary diagnostics with installation of a new mammography apparatus Planmed Nuance Excel with direct digitalization. The new system offers a much higher quality of imaging, reduces the general dose of radiation and is cost efficient. In the nationwide evaluation of indicators of the quality of mammography screening the mammography clinic of the Na Homolce Hospital ranked again among the 5 best clinics of the 60 evaluated centers in the Czech Republic.

Ultrasound diagnostics underwent significant changes in 2009 associated with acquisition of two new ultrasound devices that are used primarily for ultrasound examination in the mammology program as well as for routine ultrasound examination of the abdomen and soft tissues. The whole documentation is stored in the digital form and readily available to all physicians in the whole hospital.

All **radiography and radioscopy** images are filed in the Hospital in-

formation system, where they are immediately available to physicians from the entire hospital. Thus, starting from 2009, the operation of the Radiodiagnostic Department is fully digitalized, i.e. no films are used.

In 2009, the Department of Radiodiagnostics participated in three grant projects.

Technical equipment

Angiography Center:	1x Multistar Siemens 1x Siemens Axiom Artis biplane 1x sálový OEC 9700
CT unit:	1x Siemens Somatom Plus 4 1x Siemens Sensation 16
MR unit:	1x Magnetom Avanto 1,5 T 1x Magnetom Symphony 1,5 T 1x GE Signa HDx (NCH sály) 1,5 T
UZ unit:	3x Toshiba Aplio 1x Toshiba Eccocee 1x GE Logiq 9
Mammography: Basic equipment:	1x Planmed Nuance Excel 3 radiosopic and radiographic units, mobile x-ray units, PACS work stations, laser cameras.

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

Basic data

Number of physicians	22
Number of laboratory technicians	28
Number of general nursing staff	8

Specialized therapeutic interventions in 2009

PTA	340
Implantation of stents into abdominal and thoracic aortal aneurysms	83
Endovascular treatment of cerebral aneurysms using GDC	32
Local thrombolysis and PTA/stent in the intra-cranial area	23
Vascular embolisation and interventions to the head and spine	18
Other endovascular interventions on cerebral arteries	22
CT-guided interventions	1 615
of this CT-guided nerve root/ joint facet injections	1 275
Vertebroplasty	97
Kyphoplasty	5
Radiofrequency ablations	27
Breast node biopsies	150
CT-guided biopsy and drainage	61

Selected radiodiagnostic examinations in 2009

Computer tomography	9 912
Magnetic resonance	11 716
Angiography	6 862
Ultrasound examinations	17 337
Mammography	12 113
Total number of radiodiagnostic examinations	105 996

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

DEPARTMENT OF NUCLEAR MEDICINE / PET CENTER

Head of Department Ass. Prof. Otakar Bělohávek, M.D., Ph.D.

The services provided by the center include **scintigraphic functional imaging**, which includes **PET** (positron emission tomography) and **PET/CT** (combination of positron emission tomography and computer tomography), mainly used to diagnose oncological, neurological and cardiovascular disorders. Further services of the center include **immunoanalytic laboratory testing techniques** including RSA – radiosaturation analysis and chemiluminescence.

During 2008, the Department of Nuclear Medicine / PET Center continued to serve patients in the Na Homolce Hospital as well as those from other healthcare facilities throughout the Czech Republic (primarily **PET/CT examinations**). In 2009, the number of PET interventions and examinations reached 6 252 which is a 15.1% increase as compared to 2008. All the examinations were performed using two hybrid PET/CT Siemens Biograph scanners. Throughout the year, the Department succeeded in maintaining a high standard of productivity of labour in the PET diagnostics, comparable with other European clinics. Starting from 5 February 2009, the Department extended the PET/CT diagnostics using the latest type of the hybrid PET/CT scanner Biograph 40 TruePoint TrueV HD. The Department carried out routinely PET/CT examinations of mitotic activity of cerebral tumors by means of [¹⁸F]-FLT

Although **scintigraphic diagnostics** including SPECT recorded a slight increase in the number of examinations in 2009 as compared to the previous year, the mid-term trend shows its decrease. The reason is the global decline of interest in scintigraphic examinations that

are partly replaced by other imaging methods, including PET/CT. As a result, the Department focuses ever more on the perspective PET/CT diagnostics. Examination of bones and myocardium accounted for the biggest share in scintigraphic examinations, other methods were used only in specific cases.

The **immunoanalytic laboratory** reported a slight increase in the number of assays performed in 2009 (by 4.1% as compared to 2008) in all the groups, except for the congenital development disorders markers.

The Department of Nuclear Medicine/PET Center has been awarded ISO 9001-2000 certification on the basis of a certification audit carried out by the Det Norske Veritas firm of auditors. In 2009, the department successfully completed a recertification audit.

In 2009, the physicians of the Department were involved in post-graduate teaching within the Institute for Postgraduate Studies and carried out expert activities for the European Commission.

In 2009, the department participated in five grant projects.

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

The services provided by the center include scintigraphic functional imaging, which includes PET (positron emission tomography) and PET/CT (combination of positron emission tomography and computer tomography).

Basic data

Number of physicians	7
Number of college graduates/ other medical staff	4
Number of nursing and paramedical staff	16

Technical equipment

Devices 2 scintillation cameras
2 PET/ CT hybrid cameras
Imaging station
Immunoanalyzers

Number of interventions/ examinations in 2009

Radiography

number of examinations	1 424
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Positron emission tomography

number of examinations	6 252
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Laboratory tests

number of interventions	144 879
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number of assays	111 355
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SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

DEPARTMENT OF CLINICAL BIOCHEMISTRY, HEMATOLOGY AND IMMUNOLOGY

Head of Department Luděk Táborský, M.D.

In the field of **clinical biochemistry** the department provides a routine biochemical service for both hospital wards and outpatient clinics in Na Homolce Hospital, and focuses on the diagnosis and treatment of critically ill patients admitted to the hospital. In the case of inpatients in a critical state, tests of acidobasic balance, selected mineral levels and glycaemia are carried out directly by the bedside (POCT diagnostics), and all patients are screened for mineral levels, enzyme activities, substrate concentrations, cardiomarker levels, amino acids, selected prohormones, vitamins, the full range of lipids and drug levels and their metabolites, including pharmacokinetic analyses of concentrations measured.

In the period under review, the Department installed the CTA Beckman Coulter aliquotter module and ensured the associated adaptations and reconstructions of the biochemical laboratory. A new screening examination for intestinal carcinoma – Haemocult, and the FOBT screening method for occult bleeding in intestinal carcinomas were introduced. Another newly introduced method is determination of direct LDL-cholesterol for diagnostics of lipid and lipoprotein metabolism disorders.

In 2009, the clinical biochemistry continued to provide services to general practitioners, pediatricians and other specialists working in the field. The department's efforts to continually expand and improve the quality of its services resulted in a wider range of examinations offered and introduction of certain new parameters.

The analysis of lipid metabolism diagnosis is an important part of the work carried out by the biochemical unit. In the previous year, the **Club of Parents of Children Suffering from Lipid Disorders** continued to provide a metabolic counseling service in the area of rehabilitation, reconditioning and educational activities for Club members.

The **hematology** laboratory provides a routine service for clinical units and conducts both basic and specialized coagulation tests, including screening for thrombophilia, particularly for departments involved in the Cardiovascular program. In 2009, the hematology laboratory put into operation the Sysmex XE 5000 hematological line for analysis of the blood count, body fluids, specimen staining and hematological differential analysis.

The **Transfusion Center** ensures a supply of blood and blood derivatives.

The **Immunology Laboratory** performs a wide range of a wide range of examinations of both humoral and cellular immunity, autoimmunity conditions of systems and organs and allergies. Specialized activity of the laboratory is focused on diagnostics of septic conditions in critically ill patients. The outpatient department of allergology and clinical immunology provides care to patients with allergies, immunodeficiencies and immunopathological conditions. In patients suffering from the bronchial asthma, it uses the latest outpatient examination diagnostics by non-invasive examination of the exhaled air, using and functional tests of bronchial hyperreactivity.

In 2009, the laboratory continued to apply a wide range of examination methods, with a focus on diagnostics of immunopathological conditions in relation to the activities of individual departments of the Hospital. In cooperation with the Department of Cardiology of the Na Homolce Hospital, the laboratory carried out a study of PLAC test in patients with acute coronary syndrome as a new independent biomarker of the risk of cardiovascular and cerebrovascular accidents. In cooperation with external healthcare facilities, it dealt with the issues of organ transplantations, immunologic diagnostics of

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

In the field of clinical biochemistry the department provides a routine biochemical service for both hospital wards and outpatient clinics in Na Homolce Hospital, and focuses on the diagnosis and treatment of critically ill patients admitted to the hospital.

septic patients and examination of gene expression in critically ill patients. Allergology diagnostics extended the range of food allergens for the functional basophil activation test. Examination of specific IgE antibodies was complemented by *Aspergillus fumigatus*, marker for allergic bronchopulmonary aspergillosis.

In addition to its routine activities, the outpatient department of allergology and clinical immunology makes also provocation tests of bronchial hyperreactivity for patients of the Na Homolce Hospital as well as for patients from external healthcare facilities.

The **Laboratory for Cerebrospinal Fluid and Neuroimmunology** carries out routine analyses of serum and cerebrospinal fluid on patients with diseases of the central and peripheral nervous system. It also serves as a long-term reference center for cerebrospinal fluid laboratories in the Czech and Slovak republics, particularly in the area of cytological analysis, as well as the quantitative and qualitative examination of cerebrospinal fluid and serum proteins. The Laboratory is an External Quality Control System (SEKK) reference lab for the External Quality Control System in tests on cerebrospinal fluid in the Czech Republic and Slovakia.

The **DNA Diagnostic Laboratory** carries out molecular genetic diagnostics of hereditary diseases and genetic predispositions for diseases frequently occurring in the population and serious diseases. Within the hospital, the Laboratory focuses primarily on specific cases depending on the needs of individual units. The DNA Diagnostic Laboratory is a member of the Neurogenetic Center at the Charles University's Second Faculty of Medicine and a member of the Czech Group for Chronic Lymphocytic Leukemia (CLL) of the Czech Hematology Society at the Czech Medical Association of J. E. Purkyně (ČLS JEP).

The Department of Clinical Biochemistry, Hematology and Immunology was included in the system of external quality control in the Czech Republic (SEKK), in Germany (INSTAND), in the Netherlands (SKZL) and in Great Britain (NEQAS). It has earned an ISO 9001-2000 quality certificate, that was awarded to it on the basis of a certification audit carried out by the Det Norske Veritas auditing firm. In 2009, the Department successfully completed a recertification audit.

In 2009, the Department of Clinical Biochemistry, Hematology and Immunology participated in 4 grant projects.

Basic data

Number of physicians	12
Number of college graduates / other medical staff	5
Number of nursing and paramedical staff	47
Number of general nursing staff	6
Total number of examinations performed	2 193 779

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

Breakdown of laboratory tests in 2009

DCBHI	Number
Total Biochemistry (including POCT)	1 766 612
Hematology	248 844
Immunology	98 934
DNA diagnostics laboratory	38 201
Blood bank	41 188
Total laboratory tests	2 193 779

Breakdown of DCBHI outpatient numbers in 2009

Type of outpatient clinic	Number
Metabolic	6 355
Hematologic	1 794
Immunology and allergology	6 284
Total	14 433

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

DEPARTMENT OF CLINICAL MICROBIOLOGY AND ANTIBIOTIC CENTER

Head of Department Vlastimil Jindrák, M.D.

The Department of Clinical Microbiology provides **laboratory diagnostics of community and nosocomial infectious diseases or complications** in hospitalized patients, as well as consultative work dealing with their diagnosis, treatment and prevention. The department's consultants participate in routine interdisciplinary work in a team of specialists to provide the highest possible level of treatment for both ward patients and outpatients. The laboratory diagnostic services have traditionally been provided both to the Na Homolce Hospital, as well as to primary care general practitioners and specialists working in the field.

In 2009, the demand for **laboratory microbiological examinations** recorded a relative decline both from the Na Homolce Hospital and the external clientele. The laboratory implemented successfully a new technology for serologic diagnostics, extended the range of examinations and expedited availability of results. Cooperation with several external clients was terminated. The system of electronic transmission of the results of examinations to external healthcare facilities is used routinely.

An important part of the department's activities comprises the work of the **Antibiotic Center**, which deals with antibiotic practices in Na Homolce Hospital, as well as in primary outpatient care. Parameters of consumption of antibiotics as well as incidence of antibiotic resistance were comparable with the figures from the previous period, without any significant changes. The number of consultations was about the same as in 2008. From the viewpoint of antibiotic resistance, decline was recorded in the MRSA incidence in invasive infections (only one case was identified). In other pathogens no major changes were found out.

In the area of prevention and control of infection, the Department includes **an infection control unit**. In 2009, the lowest incidence was achieved of nosocomial infections of the blood circulatory system in the last 5 years. From 2007, there was a decline from 2.47 cases to 2.04 cases per 1000 treatment days. The hospital departments with endemic incidence of MRSA (Department of Internal Medicine, Department of Vascular Surgery) succeeded in elimination of this problem, or substantially reduced it. The causes of this positive trend are in both cases further analyzed. Within preparation of the conference within the Czech Presidency of the EU Council, a study was carried out with a focus on the relation of healthcare associated infections, antibiotic resistance, mortality, cost of hospital treatment and its duration. The results were submitted in the form of a report to the Ministry of Health and were used for two communications at the EU conference on "The Microbial Threat to Patient Safety in Europe".

In the field of expert external activities, Head of the Department was also in 2009 involved in the activities carried out within ECDC (European Center for Disease Prevention and Control – antibiotic resistance agenda). He was an expert coordinator of the priority "Antibiotic resistance" of the Czech Presidency of the EU Council and in this connection he prepared in the capacity of an expert guarantor, the EU conference on "The Microbial Threat to Patient Safety in Europe", held in April 2009 in Prague. In addition, he was a member of the negotiation team of the Czech Presidency of the EU Council for approval of the "Council Recommendation on patient safety, including prevention and control of healthcare associated infections". In addition, he participated in the preparation of the National Antibiotic Program as a member of its Coordination group within the State Healthcare Institute.

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

The Department of Clinical Microbiology provides laboratory diagnostics of community and nosocomial infectious diseases or complications in hospitalized patients, as well as consultative work dealing with their diagnosis, treatment and prevention.

Public activities of the Department of Clinical Microbiology / Antibiotic Center:

Subcommission for antibiotic policy of the Czech Medical Association of J.E. Purkyně (ČLS JEP)

Head of the Department is a member of the subcommission

National Antibiotic Program

Head of the Department is a member of the Coordination group.

Working group for monitoring of resistance to antibiotics

The Department is part of the group of 45 laboratories monitoring resistance to antibiotics in the Czech Republic

Working group for the Best Laboratory Practice in medical microbiology

Head of the Department is a member of the working group.

Working group for nosocomial infections

Head of the Department is coordinator of the working group

Professional commission for medical microbiology of the Scientific Board of the Czech Medical Chamber

Head of the Department is the chairman of the Professional commission for medical microbiology of the Scientific Board of the Czech Medical Chamber

Department of microbiology of the Institute for Postgraduate Studies

Head of the Department is deputy head of this department

Accreditation commission for postgraduate education in medical microbiology

Head of the Department is a member of the commission European Society of Clinical Microbiology and Infectious Diseases (ESCMID)

Head of the Department is a member of the Society ECDC (European Centre for Disease Prevention and Control)

Head of the Department is a contact person for ECDC for the Czech Republic in the field of antibiotic resistance (national focal point)

International expert group for preparation of the “Council Recommendation on Prevention and Control of Healthcare Associated Infections” within DG SANCO

Head of the Department is member of the expert group.

WHO – BCA project (a bilateral project of WHO-EURO and the Ministry of Health CR)

Head of the Department is co-researcher within the project focused on rational use of antibiotics.

The Department of Clinical Microbiology has been awarded ISO 9001-2000 certification on the basis of a certification audit carried out by the Det Norske Veritas firm of auditors. In 2009, the Department successfully passed a recertification audit.

In 2009, the Department was involved in the undergraduate teaching for 1st and 2nd Faculties of Medicine of Charles University as well as postgraduate teaching within the Institute for Postgraduate Studies.

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

Basic data

Number of physicians	4
Number of college graduates / other medical staff	1
Number of laboratory technicians	17
Number of examinations	134 259

Consultation activity of Antibiotic center

Year	Number of consultations	Number of patients consulted (total)	Proportion of patients consulted out of the total of admitted patients	Year-on-year trend in the proportion of consulted patients
2000	4 287	905	6,5%	-10,9%
2001	5 069	1 024	6,8%	+4,6%
2002	6 076	1 266	7,5%	+10,3%
2003	6 960	1 559	9,3%	+24,0%
2004	7 291	1 622	8,4%	-9,7%
2005	8 493	1 833	10,1%	+16,8%
2006	7 922	1 870	10,4%	+3,0%
2007	8 122	1 964	10,6%	+1,9%
2008	7 847	2 006	10,9%	+2,8%
2009	8 026	1 936	10,5%	-3,7%

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

Number of examinations performed Na Homolce Hospital

Year	Bacteriology	Serology	Total
2000	35 251	11 330	46 906
2001	39 018	12 157	51 175
2002	41 473	14 282	55 755
2003	45 952	15 194	61 146
2004	54 306	17 238	71 544
2005	51 582	15 506	67 088
2006	54 726	16 511	71 237
2007	65 033	18 485	83 518
2008	68 559	18 014	86 573
2009	58 770	10 884	69 654

Number of examinations performed External clients

Year	Bacteriology	Serology	Total	Number of practical sessions
2000	44 809	8 727	53 722	180
2001	47 387	8 343	55 730	178
2002	48 985	9 380	58 355	218
2003	47 969	9 989	57 958	187
2004	54 209	11 889	66 098	185
2005	49 001	10 290	59 291	217
2006	35 680	6 460	42 140	177
2007	36 687	6 631	43 318	163
2008	40 086	7 595	47 681	141
2009	33 564	4 705	38 296	132

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

Total number of microbiological examinations

Year	Bacteriology	Serology	Total
2000	80 100	20 084	100 695
2001	86 405	20 500	106 905
2002	90 458	23 652	114 110
2003	93 921	25 183	119 104
2004	108 517	29 133	137 650
2005	100 583	25 796	126 379
2006	90 406	22 971	113 377
2007	101 722	25 122	126 844
2008	108 646	25 613	134 259
2009	92 341	15 591	107 932

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

DEPARTMENT OF PATHOLOGY

Head of Department Martin Syrůček, M.D.

The Department covers the entire scope of bioptical and cytological diagnostics within the Na Homolce Hospital, and in cooperation with the laboratories of the hospital departments providing complementary services, also part of the bioptical and cytological diagnostics for external physicians and healthcare facilities in Prague. In addition, it is responsible within the Hospital, for examination of necroptic materials (autopsies) including the organizational service. Within improvement of the quality of the provided medical care, the Department organizes clinical-pathology seminars for individual departments focused on analysis of selected necroptic and bioptical cases.

Bioptical diagnostics constitutes the core of the Department's activities. In addition to routine diagnostic biopsies, it comprises also highly specialized bioptical diagnostics focused on tumors of the central nervous system. For departments of surgery of the Na Homolce Hospital, the Department carries out urgent intraoperative examinations when the tissue specimen is delivered to the Department of Pathology, processed and macroscopically examined there still during the operation, and based on the result, further procedure and scope of the operation is modified. The Department makes demanding intraoperative bioptical examinations, including the entire range of special methods, mainly immunohistochemical examinations that increase the accuracy of bioptical diagnostics and detection of selected tumor markers.

Annually the Department of Pathology of the Na Homolce Hospital processes about 22 000 bioptical cases.

Cytological diagnostics is focused primarily on gynecology issues. Non-gynecology cytology deals with examination of aspirates or samples from other locations, including the brain.

Annually the Department of Pathology of the Na Homolce Hospital processes about 2 500 thousand cytological examinations.

Necroptic diagnostics deals mainly with autopsies and histological processing of tissues of the deceased patients. The information acquired is important to detect the immediate cause of the death and helps obtain more information about the nature and diagnostics of individual diseases. Annually the Department of Pathology of the Na Homolce Hospital performs about 200 autopsies.

Basic data

Number of physicians	5
Number of laboratory technicians	8

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

The Department covers the entire scope of bioptical and cytological diagnostics within the Na Homolce Hospital, and in cooperation with the laboratories of the hospital departments providing complementary services, also part of the bioptical and cytological diagnostics for external physicians and healthcare facilities in Prague.

Bioptical diagnostics

Year	Number of examinations	Number of specimens
2005	19 546	49 290
2006	19 730	47 866
2007	21 769	51 846
2008	22 269	56 390
2009	21 831	58 429

Necroptic activity

Year	Number of patients who died in the hospital	Number of autopsies
2005	286	248
2006	261	199
2007	273	193
2008	240	131
2009	270	154

Cytological diagnostics

Year	Number of examinations	Number of specimens
2005	5 349	11 744
2006	5 495	11 643
2007	6 813	14 082
2008	2 525	5 590
2009	2 738	6 214

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

DEPARTMENT BIOMEDICAL ENGINEERING

Head of Department Martin Mayer, M.Sc.

The Department of Biomedical Engineering of the Na Homolce Hospital is in charge of the operation and servicing of medical apparatuses in the Hospital, including the Health-resort Mánes in Karlovy Vary. Other activities of the Department include also monitoring of the new trends in biomedicine. Division of the Department into three sections is fully compatible with the prominent centers of biomedical engineering in other countries.

Preventive service section carries out preventive checks of medical apparatuses and technology stipulated by Act no. 123/2000 Coll., and the JCI standards, performs specialized internal servicing, where necessary, ensures outsourcing of the services and keeps the respective documentation on the medical apparatuses.

Clinical engineering section is in charge of the use and preparation for use of the diagnostic, therapeutic and laboratory apparatuses, expert assistance in introduction of new medical technology, monitoring of the progress in medical technology, preparation of public procurement, investments in apparatuses, other ways of funding – subsidies and gifts, cardiological electrophysiology, perfusiology, navigation systems in neurosurgery and other disciplines, autotransfusion for the Department of Cardiac Surgery and the Department of Vascular Surgery and calibration of apparatuses for anesthesia.

Metrology section is responsible for keeping the metrology standards in the Hospital in compliance with the valid metrological legislation in the scope of internal regulations of the Na Homolce Hospital and for ensuring the activity of the laboratory of the Authorized metrological center K 92 in the scope of the decision of the Office for Standards, Metrology and Testing no. 61/2000.

Department of Biomedical Engineering of the Na Homolce Hospital is an accredited center of the Ministry of Health CR for postgraduate teaching within the Institute for Postgraduate Studies, including specializations in biomedical disciplines in the Czech Republic. The Department has its representative in the Accreditation Commission of the Ministry of Health CR.

SUMMARY OF ACTIVITIES OF DEPARTMENTS PROVIDING COMPLEMENTARY SERVICES

HEALTH-RESORT MÁNES, Karlovy Vary

Manager of the health-resort care section Miroslav Wimmer, Ph.D.

Head physician Bohumil Spěvák, M.D.

Health-resort Mánes Karlovy Vary and all the related state-owned assets that it was entrusted to manage, was in April 2006 transferred by the Ministry of Health CR to a state contributory organization of the Na Homolce Hospital, including all liabilities and receivables.

Health-resort Mánes provides complex and contributory health-resort care for adults and children with diseases of the digestive tract, and metabolic diseases (diseases of liver, gallbladder, and biliary tract, stomach, intestinal diseases, diabetes, obesity).

In 2008, the services included relaxation and reconditioning stays, overweight reduction programs and family stays where control over and programs for the children on treatment stays is provided for free.

Comprehensive and contributory care is offered both to clients under health insurance programs and to domestic and foreign self-payers.

PATIENT CLUBS

Club for patients and children suffering from lipid disorders

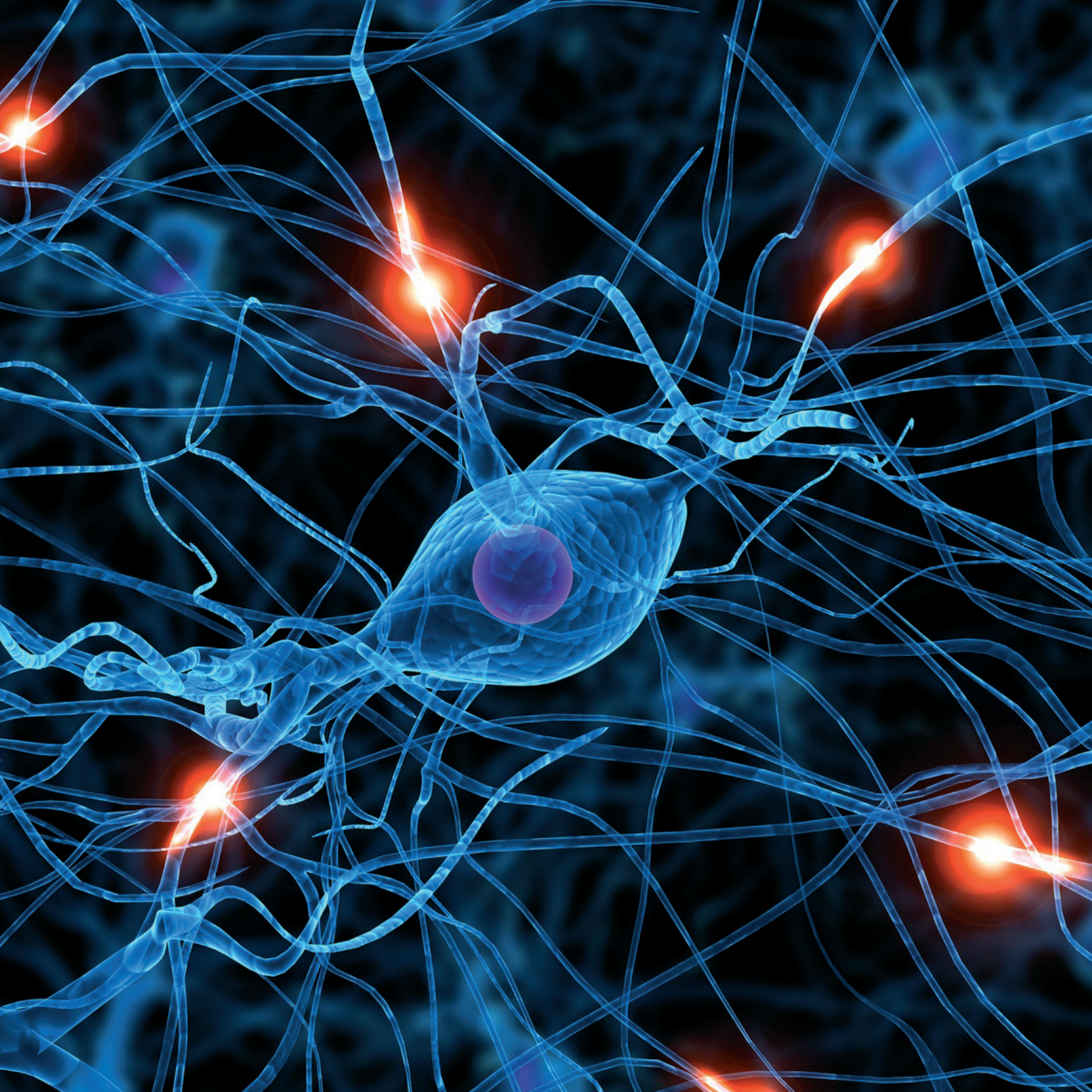
The Club was established by the Metabolic Disorders Clinic in the Na Homolce Hospital as early as in 1995. Its membership is represented by families with children suffering from inherited disorders related to the metabolism of lipids, called hypercholesterolaemia. Patients with this disorder have an increased cholesterol level in their blood, which gives rise to a high risk of cardiovascular diseases. Basic treatment for children suffering from this disorder involves keeping a controlled low-calorie diet, with medication prescribed for those patients who are worst affected. The Club is affiliated with the association for the assistance of chronically ill children. The Club is run primarily by medical volunteers and parents. Parents, doctors and dietary nurses work closely together to form proper eating habits in families at risk, to provide information on healthy nutrition and suitable types of food products, as well as on new discoveries concerning the treatment of hypercholesterolaemia. The Club's traditional and popular activities include the publication of the club magazine Cholesterol, organised water therapy exercises in the Na Homolce Hospital pool, day or weekend trips and, most of all, the summer fitness camp, focusing on a low cholesterol diet and exercise. In the summer of 2009, the children and their parents met at the 13th one-week therapeutic camp with a low-calorie diet at Hojsova Stráž in the Šumava region. The Club for Parents and Children Suffering from Lipid Disorders plays an important part in preventing cardiovascular diseases by encouraging healthy nutrition and eating habits, as well as increased physical activity.

Contact details: Club for Parents and Children Suffering from Lipid Disorders Clinic for Metabolic Disorders
Na Homolce Hospital
Roentgenova 2, 150 30 Prague 5
Tel.: +420 257 273 229
E-mail: jana.privarova@homolka.cz

AA Homolka Club

AA Homolka Club was established by the Department of Paediatric Allergology and Clinical Immunology in the Na Homolce Hospital in 1998. It brings together families with children suffering from allergies and asthma. The membership (families) does not only consist of patients treated at Na Homolce but is also made up of those from other facilities in Prague and elsewhere. The Club's activities are diverse, ranging from the retrieval and circulation of information concerning individual allergic diseases, through the organisation of discussion with experts for the parents, to the publication of the club magazine, Motýlek (Butterfly), which includes contributions from the children themselves, or organising entertaining and educational activities for the young patients. The most popular club event is the annual three-week trip to the sea for children with allergies, where they are accompanied by medical professionals. This is for school-age children suffering from atopic eczema, bronchial asthma, allergic rhinitis, immune disorders or repeated respiratory infections. Last year the children spent their therapeutic holiday in Messagala, Greece. AAA Homolka Club is a member of the Association for the Assistance of Chronically Ill Children.

Contact details: AA Homolka Club
Department of Paediatric Allergology
and Clinical Immunology
Na Homolce Hospital
Roentgenova 2, 150 30 Prague 5
Tel.: +420 257 272 017
E-mail: jaroslava.simonickova@homolka.cz



GRANTS UNDER WAY IN 2009

GRANTS UNDER WAY IN 2009

Grant from the National Institute of Health, USA

Name:

International Multicentric Study - Freedom (Future Revascularization in Patients with Diabetes mellitus: Optimal Management of Multivessel disease)

Period: 2007 - 2015

Researchers: Mount Sinai School of Medicine, New York, USA
120 medical centers in the USA, 50 outside of the USA

SCo-researchers for Na Homolce Hospital:

Ass. Prof. Petr Neužil, M.D., PhD., FESC,
Head of Department of Cardiology,
Na Homolce Hospital
Petr Kmoníček, M.D., Department of Cardiology,
Na Homolce Hospital

Members of the Na Homolce Hospital team:

Štěpán Černý, M.D. PhD., Head of Cardiocenter,
Na Homolce Hospital, Head of Department
of Cardiosurgery, Na Homolce Hospital
Tomáš Procházka, M.D.
Petr Pavel, M.D.
Dalibor Ticháček, M.D.
Karel Kopřiva, M.D.
Lenka Pavličková, M.D.
Dagmar Vondráková, M.D.
Monika De Pasquale,
Jitka Komárková,
Liz Coling,
Karolina Smolíková

Grant NR 8937-4

Name:

Extrapyramidal diseases – correlations between morphological, functional and clinical findings

Period: 2006 - 2009

Researchers: Prof. Josef Vymazal, M.D., D.Sc., Department
of Radiodiagnostics, Na Homolce Hospital

NS 9654-4

Name:

Quantitative magnetic resonance imaging in the diagnosis and differential diagnosis of cerebral tumours

Period: 2008 - 2011

Researchers: Monika Dezortová, M.Sc., IKEM – Institute of Clinical
and Experimental Medicine, Prague

Co-researcher for Na Homolce Hospital:

Prof. Josef Vymazal, M.D., D.Sc.,
Department of Radiodiagnostics,
Na Homolce Hospital

GRANTS UNDER WAY IN 2009

MSM 0021620849

Name:

Neuropsychiatric aspects of neurodegenerative diseases

Period: 2007 - 2013

Researchers: Prof. Evžen Růžička, M.D., D.Sc.,
First Faculty of Medicine of Charles University

Co-researcher for Na Homolce Hospital:

Prof. Josef Vymazal, M.D., D.Sc., Department
of Radiodiagnosics, Na Homolce Hospital

Grant NS 10587-3

Name:

Diagnostics of vascular prosthesis infection using 18F-FDG PET/CT.

Period: 2009 – 2011

Researchers: Miroslav Špaček, M.D., General University Hospital, Prague

Co-researchers for Na Homolce Hospital:

Jana Votrubova, M.D., PhD., Department
of Radiodiagnosics, Na Homolce Hospital

Grant 1A8629-5

Name:

**Using deep cerebral stimulation in the treatment of the
Parkinson disease and other extrapyramidal motion disorders**

Period: 2005 – 2009

Researchers: Prof. Evžen Růžička, M.D., D.Sc., First Faculty
of Medicine of Charles University

Co-researcher for Na Homolce Hospital:

Dušan Urgošík, M.D., Ph.D., Department of Stereotactic
and Radiation Neurosurgery, Na Homolce Hospital

Grant GAČR 309/091145

Name:

**Mechanisms of deep cerebral stimulation: the task
of subthalamus in motor, visual and affective processes**

Period: 2009 - 2012

Researchers: Ass. Prof. Robert Jech, M.D., PhD., First Faculty
of Medicine of Charles University

Co-researcher for Na Homolce Hospital:

Dušan Urgošík, M.D., Ph.D., Department of Stereotactic
and Radiation Neurosurgery, Na Homolce Hospital

Research Center established by the Ministry of Education, Youth and Sports: IM0002375201

Name:

**Center of Neuropsychiatric Studies - neurobiology in clinical
practice. Na Homolce Hospital's part of the project**

Using positron emission tomography to study
neuropsychiatric disorders

Period: 2005 – 2009

Researchers: Prof. Cyril Höschl, M.D., D.Sc., Psychiatric Center Prague

Co-researcher for Na Homolce Hospital:

Ass. Prof. Otakar Bělohávek, M.D., Ph.D., Department of
Nuclear Medicine / PET Center, Na Homolce Hospital

GRANTS UNDER WAY IN 2009

IGA Grant, Ministry of Health CR: NR 8033-6:

Name:

Reduction of the toxicity of the primary treatment of advanced Hodgkin lymphoma

Period: 2004 – 2009

Researcher: Jana Marková, M.D., Department of Clinical Hematology of the University Hospital at Královské Vinohrady

Co-researcher for Na Homolce Hospital:

Ass. Prof. Otakar Bělohávek, M.D., Ph.D., Department of Nuclear Medicine / PET Center, Na Homolce Hospital

Grant NR 8843-4

Name:

Pharmacoresistant focal epilepsy with normal MRI finding: Analysis of etiopathogenesis and assessment of benefits of different diagnostic methods

Period: 2006 - 2009

Researcher: MUDr. Pavel Kršek, Ph.D., 2. LF UK

Co-researcher for Na Homolce Hospital:

Ass. Prof. Otakar Bělohávek, M.D., Ph.D., Department of Nuclear Medicine / PET Center, Na Homolce Hospital

Grant NR 9502-3

Name:

Integrated FDG – positron emission and computer tomography as the basic imaging method in the assessment of patients with non-Hodgkin lymphomas

Period: 2007 - 2009

Researcher: Tomáš Papajík, M.D., Ph.D., Palacký University, Olomouc

Co-researcher for Na Homolce Hospital:

Magdalena Skopalová, M.D., Department of Nuclear Medicine / PET Center, Na Homolce Hospital

Grant NR 9453-3

Name:

Protocol enhancement of patient care based on intermediate PET restaging and the analysis of treatment effectiveness in patients with non-Hodgkin lymphomas (retrospective appraisal from the register of Co-operative Lymphoma Group)

Period: 2007 - 2009

Researcher: Ass. Prof. Marek Trněný, M.D., Ph.D., General University Hospital, Prague

Co-researcher for Na Homolce Hospital:

Iva Kantorová, M.D., Department of Nuclear Medicine / PET Center, Na Homolce Hospital

GRANTS UNDER WAY IN 2009

Grant NS 10420-3

Name:

Positron emission tomography for diagnosis and follow-up of testicular terminal tumours

Period: 2009 – 2011

Řešitel: Tomáš Buchler, M.D.,
Thomayer University Hospital, Prague

Co-researchers for Na Homolce Hospital:

Kateřina Šimonová M.D., Department of Nuclear
Medicine / PET Center, Na Homolce Hospital

Grant FT-TA3/053

**Ministry of Industry and Trade CR
TANDEM Program**

Name:

Development of a new generation of diagnostic sets for in vitro diagnostics of cardiovascular diseases – based on molecular bio technology methods

Period: 2006 – 2010

Researcher: Josef Fišer, M.D. - GeneTiCA s.r.o.

Co-researcher for Na Homolce Hospital:

Václav Maťoška, M.D., Department of Clinical Biochemistry, Haematology and Immunology, Na Homolce Hospital

Grant FR – TI 1/399

Ministry of Industry and Trade CR

Name:

Development of pharmacogenetic diagnostic kit for determination of the Warfarin dose

Period: 2009 - 2012

Researcher: RNDr. Radek Horváth, PhD. - GeneProof, a.s.

Co-researcher for Na Homolce Hospital:

MUDr. Václav Maťoška, Oddělení klinické biochemie,
hematologie a imunologie, Nemocnice Na Homolce

Grant GAČR 202/09/H086

Name:

Use of ionizing radiation in dosimetry and radiological physics.

Period: 2009 – 2011

Researcher: prof. Ing. Tomáš Čechák, PhD.,
Czech Technical University, Prague

Co-researchers for Na Homolce Hospital:

Václav Maťoška, M.D., Department of Clinical Biochemistry, Hematology and Immunology, Na Homolce Hospital

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Chapters in books

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LIŠČÁK, R. - ŠIMONOVÁ, G. Stereotactic radiosurgery for ocular disorders. In Intracranial stereotactic radiosurgery. New York: Thieme, 2009, pp. 131-141. ISBN 978-1-60406-200-7.

ŠTÁDLER, P. Robotic-assisted aortic suture: another step in laparoscopic surgery?. In New technologies in Vascular biomaterials. Strasbourg, France: OTT imprimeurs SAS, 2009, pp. 269-275. ISBN 978-2-9523959-2-2.

Articles in Impact Factor journals

AHMED, H. - NEUŽIL, P. - AVILA, A. - MAREŠ, K. The esophageal effects of cryoenergy during cryoablation for atrial fibrillation. Heart Rhythm, 2009, vol. 6, no. 7, p. 970-971. ISSN 1547-5271.

ČÁP, P. - MALÝ, M. - PEHAL, F. - PELIKAN, Z. Exhaled leukotrienes and bronchial responsiveness to methacholine in patients with seasonal allergic rhinitis. Annals of Allergy, Asthma and Immunology, 2009, vol. 102, no. 2, pp. 103-109. ISSN 1081-1206.

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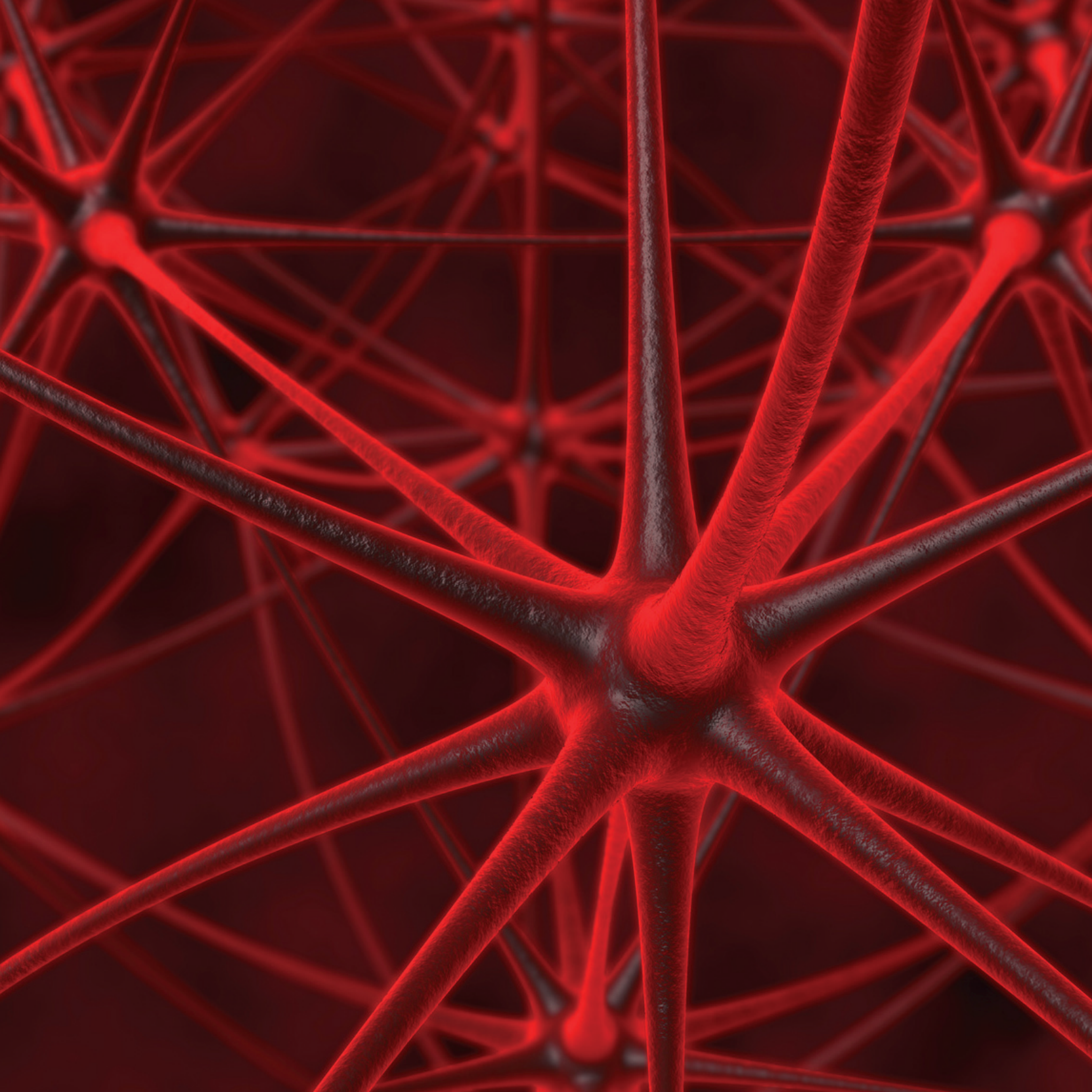
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QUALITY AND SAFETY IN 2009

QUALITY OF THE SERVICES PROVIDED BY THE NA HOMOLCE HOSPITAL IS ONE OF THE BASIC PILLARS OF THE HOSPITAL'S LONG-TERM STABILITY.

QUALITY AND SAFETY IN 2009

NA HOMOLCE HOSPITAL - JCI-ACCREDITED HOSPITAL



Quality of the services provided by the Na Homolce Hospital is one of the basic pillars of the hospital's long-term stability. Endeavouring to provide top-quality health care in compliance with clearly defined standards, the Na Homolce Hospital was encouraged to apply for the Joint Commission International (JCI) accreditation, which is the global benchmark accreditation for healthcare organisations. In June 2005, the Na Homolce Hospital successfully passed the first accreditation audit and, on JCI auditors' recommendation, it received the "global badge of quality" – the globally recognised JCI accreditation. In June

2008, the Na Homolce Hospital successfully passed a JCI re-accreditation audit, carried out by a panel of auditors and obtained JCI accreditation for the period of 2008-2011.

JCI Accreditation

Joint Commission International (JCI) is a global organisation with more than one hundred years of history, which focuses on accreditation of health-care organisations. Accredited hospitals guarantee their patients safety and top-quality care by continuously tracking, analysing and

improving quality indicators in all areas of the hospital operations. For JCI accreditation, the hospital must meet more than 1000 indicators, which have a direct impact on the patient's safety and the reliability of medical procedures. These indicators are incorporated in precisely defined accreditation standards that cover all areas of healthcare management and provision and that must be complied with if the hospital is to obtain JCI accreditation. JCI accreditation is awarded for three years: when this period elapses the healthcare organisation must apply for a new accreditation.

JCI Standards

The extended JCI 2008 standards comprise the following chapters:

1. Availability and continuity of care
2. Rights of patients and their families
3. Diagnostic care
4. Therapeutic care
5. Anaesthetic and surgical care
6. Storage, prescription and administration of medicines
7. Education of patients and their families
8. Improving the quality of care and safety of patients
9. Prevention and control of hospital infections
10. Management and governance
11. Safety of the hospital environment
12. Staff qualification and education
13. Information management



QUALITY AND SAFETY IN 2009

JCI safety objectives

Provision of safe medical care that will minimize the number of errors is specified in detail by JCI under the title "Safety objectives". These objectives cover the "risky" situations during the patient's stay in the hospital and require of the hospital to define, monitor and evaluate the procedures conducting to their fulfilment.

JCI safety objectives:

- Proper identification of the patient
- Safe communication
- Handling of high-risk drugs
- Prevention of faults during invasive interventions
- Prevention of nosocomial infections – hygiene
- Prevention of patients' falling down in the hospital facility

Quality and Safety Committee

Since 2004, the Quality Management advisory board for the Hospital Director has been the Quality and Safety Committee, where physicians and nurses are represented as well as administrative and technical staff. The board is interdisciplinary, which enables it to make complex analyses of reported adverse events and submit proposals to prevent such events in the Hospital. The Committee prepares also proposals for implementation of changes of practices in compliance with the new JCI standards and legislation. In addition, it concentrates suggestions provided by employees in this respect. Based on the risk analysis, it proposes remedial and preventative measures to the hospital executives.

Quality and safety of the care in 2009

1. Prevention of patients' falling down

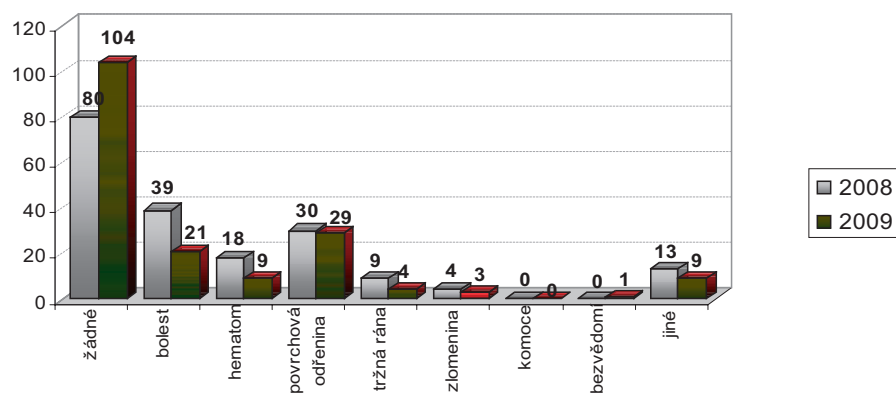
A system to improve quality and patients' safety has been introduced in the Na Homolce Hospital with the aim to minimize errors in the process of providing health care. It is based on the identification of risky areas, their analysis and implementation of preventive measures.

One of the areas monitored and analyzed in the long run is prevention of falling down of risky patients. Its aim is to increase the patients' safety by ensuring a safe environment and regimes conducting to minimization of the risk of their falling down and subsequent health complications. As shown by the graph below, the Hospital succeeds in the long run to reduce the number of such accidents and severity of injuries caused by falling down.

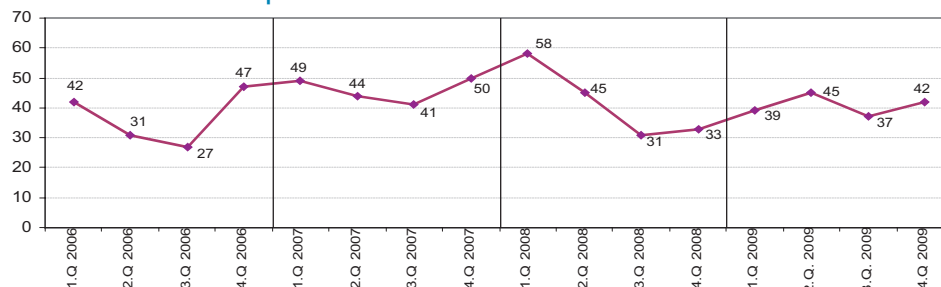
QUALITY AND SAFETY IN 2009

In order to increase safety in the Hospital, gradual reconstruction was launched in 2009 of bathrooms and toilets into barrier-free premises that will provide the patients with higher comfort and reduce the risk of their falling down.

Type of injury caused by the patient's falling down – 2008 and 2009 comparison



Monitoring of the number of patients' falling down in the Na Homolce Hospital



QUALITY AND SAFETY IN 2009

2. Safety rules for the use of venous ports, probes and other invasive catheterizations

The Na Homolce Hospital has a high number of intensive care beds and a high number of patients with more than one invasive port. Each invasive port is associated with a certain risk for the patient. The risk of error on the part of the staff in the use of invasive ports for treatment increases with the number of invasions in one patient, and the consequences may be fatal. Therefore a procedure has been developed which standardizes visual differentiation of individual ports in order to prevent their confusion in application of the medication and incorrect interconnection of individual systems.

3. Clinical competencies of physicians

One of the JCI requirements is setting valid clinical competencies and specification of the clinical services which the respective physician is authorized to provide. In order to ensure compliance with the SQE standards – Staff Qualification and Education, a project was launched in 2009, focused on specification of clinical competencies of physicians. The aim of the project is to ensure a consistent and provable standard of the medical care and provide Head of the respective department with a basis for evaluation of qualification of individual physicians. Each department has a list of all interventions being performed. Responsible for allocating clinical competencies to physicians (authorization to perform independently therapeutic and diagnostic procedures) is Head of each department. The competencies are part of the personal file of each physician and will be annually revised. Any change in the competencies in terms of extension, reduction or any other adjustment will be documented.

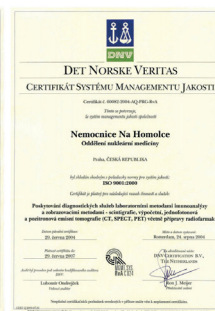
Na Homolce Hospital –an ISO 9001:2000 certified facility

Three departments of the hospital – the Department of Clinical Biochemistry, Hematology and Immunology (OKBHI), Department of Clinical Microbiology/Antibiotic Station (KMAS) and Department of Nuclear Medicine/PET Center (ONM) – are bearers of quality management system certificates for their laboratory and diagnostic services under the ISO 9001:2000 Standard. ISO certification requires continuous quality improvement in relation to the patients as well as in relation to staff safety. The aim of this quality management system is early detection and elimination of various risks, leading to higher safety of healthcare provision.

The certificate was successfully defended in 2009 at all the certified Departments



OKBHI Certificate



ONM Certificate



KMAS Certificate

QUALITY AND SAFETY IN 2009

Preparation for ISO 15189

In 2009, four hospital laboratories – RIA laboratory, Department of Clinical Biochemistry, Hematology and Immunology, Department of Clinical Microbiology /Antibiotic Center and Department of Pathology launched intensive preparation for accreditation according to ISO 15 189.

The ISO 15 189 standard is intended for medical laboratories and stipulates special requirements mainly as concerns the quality and qualification of these laboratories. It is largely based on the ISO 17 025 standard but puts greater emphasis on the pre-analytical, analytical and post-analytical phases. For a medical laboratory it is a suitable way to declare the quality of its services.

QUALITY AND SAFETY IN 2009

QUESTIONNAIRE ON PATIENT SATISFACTION IN NA HOMOLCE HOSPITAL

Satisfaction of inpatients

1. Required to move after admission if required	1,12
2. Orientation within the hospital	1,45
3. Organization of central admissions procedure	1,16
4. Waiting time for admission to the department	1,33
5. Hygiene	1,15
6. Amount and quality of food	1,30
7. Personal comfort and privacy	1,21
8. Quietness of the department	1,15
9. Examination appointments kept	1,16
10. Explanations given of your condition	1,17
11. Treatment provided for pain	1,06
12. Staff cooperation with your family	1,10
13. Nurses' attitude and willingness to help	1,08
14. Attitude of the physicians	1,06
15. Sufficient information provided on discharge	1,12

Satisfaction of outpatients

1. Orientation within the hospital	1,12
2. Approach and willingness of client files administrators	1,45
3. Approach and willingness of physicians	1,16
4. Approach and willingness of nurses	1,33
5. Privacy during examination	1,15
6. Environment and personal comfort	1,30
7. Explanations given of your condition	1,21
8. Meeting your expectations of the visit	1,15
9. Information provided concerning future treatment	1,16
10. Length of time spent waiting for examinations	1,17

Average quality in Na Homolce Hospital 1,20

Legend: Expression of satisfaction 1- 5
 Threshold value 1,50



ECONOMIC STABILITY

NA HOMOLCE HOSPITAL STRIVES
FOR MAXIMAL COST EFFICIENTCY
WHILE ENSURING WIDELY AVAILABLE SPECIALIZED
MEDICAL CARE.

AUDITOR'S REPORT

We have audited the accompanying financial statements of the Na Homolce Hospital semi-budgetary organization with the seat in Prague 5, Roentgenova 2, Postal Code 150 30, Company registration number 00023884, i.e. the balance sheet as of 31 December 2009, and the income statement for the period between 1 January 2009 and 31 December 2009, and a summary of significant accounting policies and other explanatory notes. Data on the Na Homolce Hospital semi-budgetary organization are included in Annex to these financial statements.

Statutory Body's Responsibility for the Financial Statements

The Statutory Body of the Na Homolce Hospital is responsible for the preparation and fair presentation of these financial statements in accordance with Czech accounting regulations. This responsibility includes: designing, implementing and maintaining internal control relevant to the preparation and fair presentation of financial statements that are free from material misstatement, whether due to fraud or error; selecting and applying appropriate accounting policies; and making accounting estimates that are reasonable in the circumstances.

Our responsibility is to express an opinion on these financial statements based on our audit. We conducted our audit in accordance with the Act on Auditors and International Standards on Auditing and the related application guidelines issued by the Chamber of Auditors of the Czech Republic. Those standards require that we comply with ethical requirements and plan and perform the audit to obtain reasonable assurance whether the financial statements are free from material misstatement.

Auditor's Responsibility

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditor's judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. An audit also includes evaluating the appropriateness of accounting policies used and the rea-

sonableness of accounting estimates made by management, as well as evaluating the overall presentation of the financial statements. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

Auditor's Opinion

In our opinion, the financial statements give a true and fair view of the financial position of the Na Homolce Hospital semi-budgetary organization as of 31 December 2009, and of its financial performance for the year then ended in accordance with Czech accounting regulations.



In Prague, 30 April 2010

Ing. Hana Filipcová - auditor
Registration in the list of auditors
of the Chamber of Auditors CR no. 0649

PKF Czech Republic
Karlova 455/48, 110 00, Prague 1
Registration in the list
of audit firms of the Chamber
of Auditors CR no. 031

ECONOMIC DATA

BALANCE SHEET (IN THOUSANDS OF CZK)

ASSETS	31. 12. 2009	31. 12. 2008
A. Fixed assets	1 860 703	1 781 906
1. Intangible fixed assets	52 840	51 734
2. Accumulated depreciation of intangible fixed assets	-47 820	-43 350
3. Tangible fixed assets	3 584 502	3 382 206
4. Accumulated depreciation of tangible fixed assets	-1 729 719	-1 609 584
5. Financial investments	900	900
B. Current assets	872 298	844 739
1. Inventory	36 986	29 207
2. Receivables	522 191	473 469
3. Financial assets	240 492	277 362
5. Temporary asset accounts	72 629	64 701
TOTAL ASSETS	2 733 001	2 626 645

LIABILITIES	31. 12. 2009	31. 12. 2008
C. Own resources	2 076 826	1 899 027
1. Property funds	1 832 985	1 732 529
2. Financial and cash funds	190 301	110 373
5. Net income	53 540	56 125
D. Other resources	656 175	727 618
1. Reserves	80 000	40 000
2. Long-term liabilities	25 396	45 386
3. Short-term liabilities	366 529	378 644
4. Bank loans and borrowings	160 000	180 000
5. Temporary debit accounts	24 250	83 588
TOTAL LIABILITIES	2 733 001	2 626 645

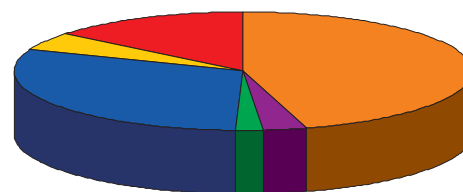
ECONOMIC DATA

PROFIT AND LOSS ACCOUNT (IN THOUSANDS OF CZK)

	31. 12. 2009	31. 12. 2008
Costs		
Raw material	1 590 005	1 604 504
Energy used	60 337	55 510
Goods sold	115 028	102 650
Account.adjust., travel exp., services	315 387	224 246
Personnel expenses	1 065 744	999 162
Other and financial expenses	174 800	193 553
Depreciation of fixed assets	178 422	156 544
Total costs	3 499 724	3 336 169
Revenues		
Revenues from own products and services	3 234 003	3 011 749
Revenues from goods	143 062	129 537
Change in inventory of own production + capitalization	0	0
Other and financial revenues	176 198	251 008
Total revenues	3 553 264	3 392 294
Profit (loss) for the current accounting period	53 540	56 125

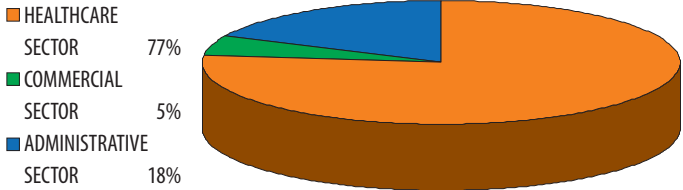
breakdown of costs by type

material	45%
consumption of goods	3%
energy	2%
personnel expenses	30%
depreciation	5%
other	14%

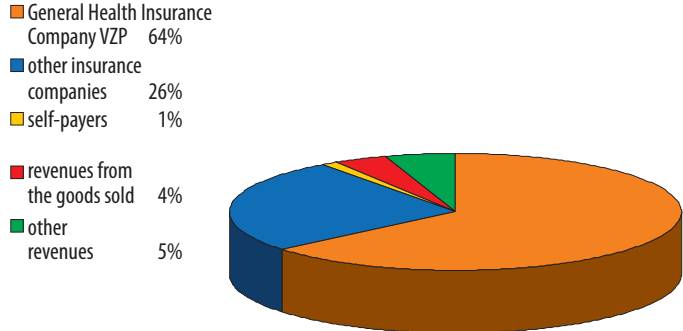


ECONOMIC DATA

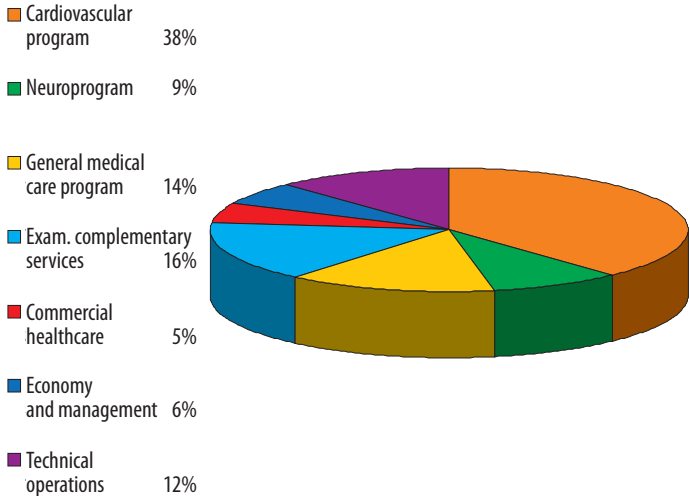
breakdown of costs by type



breakdown by revenues



breakdown of costs by programs



ECONOMIC DATA

total costs and revenues

	2009	v milionech Kč
revenues	3 553 263 756	3 553
costs	3 499 724 169	3 500
profit/ loss	53 539 587	54
consumption of material	1 590 004 761	1 590
personnel expenses	1 048 792 432	1 049
depreciation	178 422 441	178

IDENTIFICATION DATA

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