“We are committed to providing comprehensive healthcare services, whether people are in cities or in rural areas, and to providing the latest technology and treatments and technical and medical specialists in all our facilities.”
“Attracting the world’s best healthcare institutions to the Emirate of Abu Dhabi is a vital part of the Government’s health policy. It ensures the very best global healthcare management expertise is available without the need to travel.”
His Highness Sheikh Mohammed bin Zayed Al Nahyan
Crown Prince of Abu Dhabi
Deputy Supreme Commander of the UAE Armed Forces
Chairman of the Abu Dhabi Executive Council
Emiri Decree No 10 of 2007 that formed Abu Dhabi Health Services Company PJSC (SEHA) requires that we report annually on our business activities.

In complying with this important requirement, we believe we also have an opportunity to inform and communicate in plain language how the business of healthcare works. We trust that this report will help you understand the key indicators that point to a healthy business, along with the quality markers that signpost continuing improvement in quality outcomes for our patients.

We also wish to report on our accomplishments: the activities and successes we have enjoyed in the past year, the challenges we see in the near term, and the vision we have for the future.

Contents

6 Chairman’s Report  26 Five Year Strategic Plan
8 Board of Directors  27 A Stronger Focus
10 Chief Executive Officer’s Report  28 Benchmarking with USA
12 Executive Management  30 Key Indicators
13 Corporate Structure  31 Operational Dashboard
14 Network Map  32 SEHA Circle of Excellence Leadership Awards
16 SEHA Operational Model  34 SEHA Accomplishments
17 Setting sights ever higher  35 2011 Performance
19 Clinical – Matching up with the best  63 Management Service Agreements – Partner Performance
21 Financial – Revenue growth trend continues  64 Corporate Social Responsibility
23 Operational – Awards underline quality achievement  65 Corporate Governance
24 Leading the Way to Healthcare Excellence  67 Facilities Projects
25 Integrated Healthcare Delivery  68 Contact Directory
The close of 2011 marked two significant milestones for SEHA – completion of its fourth full year of operations and the first year of its new Five Year Strategic Plan. Cumulatively, and over the preceding 12 months, SEHA can look back on a growing list of achievements, all contributing to remarkable progress towards the goal of world-class healthcare. This annual report focuses in detail on the three primary areas that underpin SEHA’s role as a cornerstone of Abu Dhabi’s vision to be one of the world’s greatest cities: clinical, operational, and financial.
With the close of 2011, we complete our fourth operational year amid a flurry of accomplishments and recognitions.

Not only did we receive significant local recognition in the form of the Sheikh Khalifa Award for Excellence (Silver Level), but SEHA’s Mafraq Hospital was granted Diamond Status in healthcare, the first such institution to be so recognized in that category.
Internationally, SEHA was recognized by the Arab Hospital Federation with the Excellence Award for Development of the Arab Healthcare Sector and, most recently, in Brussels with the European Award for Best Practices 2011 (Gold Category) for achievement in customer satisfaction and outstanding results in quality management. The recognition attests to SEHA’s commitment to improve its quality management system by implementing the European Society for Quality Research quality performance model.

Such recognition by those outside of SEHA is welcome. Yet we desire to achieve even greater heights as we move towards our goal of world-class healthcare for our customers and communities. Awards are good: they are testimony by third-parties looking independently at objective data. But we are not in this for awards by external endorsement. We seek the trust and recognition of the most important individuals we serve: our customers and our patients. This is an entirely subjective assessment and it is very rigorous in its application. For without the trust of the patient, how do we say with pride that we are achieving our goal?

To do so, we must consider the customer – our patient, the patient’s family, their friends, relatives, and associates who care for them – the most important people we value.

We can never relent in trying to do better and never do less than our best. It is a mindset. If we think quality at all times, quality will follow.

To paraphrase the adage: thoughts become words, and words become actions; actions become habits, and habits character; character becomes our destiny. In other words, we become what we think.

So I congratulate all those who worked so hard to achieve these recognitions. I congratulate our employees on making a difference in people’s lives. I challenge everyone in SEHA to think quality every day and to do even better.

We need quality outcomes and superior customer service at every patient encounter. If we think we can achieve our vision, we will – but only if we back up our thoughts with words, our words with deeds, and make quality second nature.

I thank my colleagues on the board for their continued support and guidance. I salute the Government of Abu Dhabi on its vision for its people, and I thank our enlightened and visionary leaders for their faith and support of our goals.

---

Saif Bader Haji Al Qubaisi
Chairman
It is gratifying to look back at the successes of Abu Dhabi Health Services Company (SEHA) in the course of 2011 and marvel at the extent of our achievement in a relatively short period.

And yet I am in awe of the challenges that lie ahead. This is why healthcare is so rewarding as a career: it is as relentless as the sea in its challenges and opportunities.
Each time we reach a new high point, it provides a glimpse over the horizon to a bright future and a view into tough and challenging work that must be accomplished. I welcome these challenges, and I am thrilled to be working in an organization dedicated to achieving our vision of world-class healthcare.

As we completed 2011 – the first year of our new Five Year Strategic Plan and our fourth full year of operations – we closed a period of significant activity. I am pleased to report an increase in net patient revenue compared to 2010, along with favorable growth in both admissions and visits, improved revenue per patient visit, reduced claims denials, and better collection patterns.

Significantly, SEHA continues to show a favorable revenue growth trend per adjusted patient day (APD); however, operating cost per APD increased from the prior year due to increases in salaries, wages and benefits, and supplies expense.

Part of this arises from compensation adjustments necessary to retain our medical staff. We also completed the Hewitt Project that realigned SEHA HR practices and salary scales across the board. Every employee who works for us now has a defined job and defined grade. It is a major achievement that will pay dividends in the future.

While I am pleased with all of these positive financial indicators, I am anxious for us to accelerate and concentrate on our mission of continuous improvement to recognized international standards, especially in relation to quality patient care and process improvement.

We will begin to ramp up the focus of our efforts towards identifiable standards of excellence in what defines a world-class healthcare organization, benchmarked against the best in the world. The standards and protocols are available and we now have systems, databases, and collection mechanisms in place to establish comparisons of how we deliver quality healthcare and how the best in the world do the same procedures. We can determine if we are helping patients recover from procedures as rapidly as the top medical centers across the globe.

We are achieving world-class benchmarks in many areas, but we have much more to do to achieve greatness. Our main goal is quality patient outcomes, and we cannot just point to good financial performance and happy patient satisfaction scores if we know that we still have work to do in outcomes management to make people better faster and more effectively.

Customer service remains a challenge and we must move more aggressively to meet our patients’ expectations. As our patient population becomes more knowledgeable and sophisticated, they demand higher standards.

It is the same in any business. The business-class airline seat today is the first-class seat of that same airline 15 years ago. The bar is always being raised and we have to be open to the challenge of meeting the ever-increasing expectations of our customer.

I know that we are up to all of our challenges, however difficult or formidable. That is the way healthcare people are. We love to serve, and like nothing better than to rush to the aid of an injured or ill patient with potentially non-survivable issues and get them healthy again, out the door and on their way. It doesn’t get any better than that.

I again thank our Chairman, HE Saif Al Qubaisi, for his inspired leadership, along with that of all our Emirati leaders who have so much vested in the future of SEHA and healthcare delivery in the UAE. They know the challenges of the culture and the promise of the future better than I do, and I welcome each day that I can learn from them on our goals for the future of Abu Dhabi and its residents.

I also thank our fellow caregivers, more than 17,000 of whom are working across all areas of SEHA, for their continuing efforts to help us achieve our goals for our customers and communities served.

Carl V. Stanifer
Chief Executive Officer
EXECUTIVE MANAGEMENT

Carl Stanifer
Chief Executive Officer

Dr Ali Al Obaidli
Chief Clinical Officer

Allen Harris
Chief Finance Officer

Mohamed Al Hameli
Chief Support Services

Clyde Eder
Chief Operations Officer

Saif Al Hameli
Chief Facilities and Construction

Robert Pickton
Chief Information Officer
As SEHA advances with its adoption of a “service lines” model of healthcare delivery, from 2012 the Operations Division will be reconstituted as Acute Care Hospitals and Clinical Health System Services.
<table>
<thead>
<tr>
<th>Abu Dhabi Island</th>
<th>Middle Region</th>
<th>Eastern Region</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Sheikh Khalifa Medical City</td>
<td>5 Mafraq Hospital</td>
<td>8 Al Ain Hospital</td>
</tr>
<tr>
<td>2 Corniche Hospital</td>
<td>6 Mafraq Dialysis Center</td>
<td>9 Tawam Hospital</td>
</tr>
<tr>
<td>3 Ambulatory Healthcare Services</td>
<td>7 Al Rahba Hospital</td>
<td>10 Al Wagan Hospital</td>
</tr>
<tr>
<td>4 Abu Dhabi Blood Bank</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**NETWORK MAP**
Al Gharbia Region

11 Al Sila Hospital 14 Marfa Hospital
12 Dalma Hospital 15 Madinat Zayed Hospital
13 Ghiathy Hospital 16 Liwa Hospital
Operating 12 hospitals, 62 ambulatory and primary healthcare centers, and two blood banks, with a combined total of more than 17,000 professional staff, SEHA’s operations expand across the entire Emirate of Abu Dhabi, from the Western Region to the Eastern Region through the Middle and Island Regions. As the largest healthcare network providing a continuum of care to Abu Dhabi’s residents and utilizing leading-edge medical technologies, SEHA’s facilities accommodate 100,000 inpatients annually and conduct 41,000 surgeries, as well as treating more than five million outpatients.

SEHA announced in October that Bumrungrad International would not renew its management services agreement at Mafraq Hospital and would terminate management of the business at the end of 2011.
Setting sights ever higher

Having completed its fourth operational year at the end of 2011, SEHA can look back on remarkable progress towards the goal of world-class healthcare that was set as a fundamental principle at the time of inception. In this end-year report we open with an overview of the three primary areas that determine SEHA’s success: clinical, operational, and financial. Readers can thus quickly absorb a broad-brush perspective of achievements to date and the strategies that are driving the company to its ultimate objective. Detailed information on every aspect of SEHA’s activities is contained in the latter sections of the report.
Matching up with the best

SEHA’s emphasis is now even more strongly focused on quality, patient safety, and process improvement leading to better patient outcomes. More and more facilities are achieving the ‘gold standard’ of JCI Accreditation, and strong data collection mechanisms enable better measurement of performance at all levels.
Continuous quality improvement to recognized international standards has always been a cornerstone of SEHA’s professional culture, and this will reach new levels in 2012 when evidence-based medicine (EBM) standards will be introduced to provide more detailed reporting on clinical quality issues and outcomes.

EBM has been defined as “the integration of best research evidence with clinical expertise and patient values” and is a major driving force for many of the world’s best national healthcare organizations.

EBM advocates the use of up-to-date ‘best’ scientific evidence from healthcare research as the basis for making medical decisions, offering the surest and most objective way to determine and maintain consistently high quality and safety standards in medical practice; speeding up the process of transferring clinical research findings into practice; and helping to achieve significant reduction in healthcare costs.

**Terminology explained**

The healthcare business has its own specialist language – terminology, abbreviations, and acronyms that may often be confusing for lay readers. To help achieve comprehensive understanding and to save repetition, we explain the terminology commonly used in this report.

- **Joint Commission International (JCI):** JCI is the Joint Commission International and JCIA is Joint Commission International (Accreditation). This independent and globally recognized third party provides external standards of excellence for hospital services.

- **Evidence-based medicine (EBM):** Evidence-based medicine (EBM) or evidence-based practice (EBP) aims to apply the best available evidence gained from the scientific method to clinical decision making. It seeks to assess the strength of the evidence of risks and benefits.

- **The Centers for Disease Control and Prevention (CDC):** Centers for Disease Control and Prevention is a United States federal agency operating under the Department of Health and Human Services and headquartered in Georgia. It protects health and safety by providing information to enhance health decisions, working in partnership with state health departments and other organizations.

- **The Institute for Healthcare Improvement (IHI):** The Institute for Healthcare Improvement (IHI) is an independent not-for-profit organization helping to lead the improvement of healthcare throughout the world. It was founded in 1991 and is based in Cambridge, Massachusetts.

- **HEDIS:** The Healthcare Effectiveness Data and Information Set (HEDIS) is a tool used by more than 90% of America’s health plans to measure performance on important dimensions of care and service.
SEHA Business Entities already adhere to the Quality/Patient Safety Core Measures that underpin international standards and best practices. These include: Joint Commission core measures, Institute of Healthcare Improvement (IHI), Centers for Disease Control (CDC), and Healthcare Effectiveness Data and Information Set (HEDIS) for primary healthcare indicators. In 2011 Dialysis Clinical KPIs were introduced, based on guidelines from the World Health Organization and the National Kidney Foundation.

The success of the quality management practices being adopted has been endorsed at a high level of independent external authority. The European Society for Quality Research (ESQR) gave SEHA its 2011 Gold Award for achievements in customer satisfaction and outstanding results.

Evidence-based medicine (EBM):
When best evidence from research meets clinical information and patient values, optimal decisions are possible.
External recognition is confirmed by internal research. Patient satisfaction remains high despite growing sophistication and discernment flowing from greater availability of choice between the public and private sectors. As perceptions become more acute, patients tend to grade harder but SEHA’s high scores are being maintained.

Achievements at SEHA hospitals give some pointers to the patient satisfaction scores. Every facility has recorded significant advances – from basic improvements such as reduced waiting patient times to conducting complex surgical procedures that had not previously been undertaken in the UAE (or even the wider Middle East region).

SEHA hospitals are now evolving as state-of-the-art facilities that are the cornerstones of an integrated healthcare network. Each has its unique characteristics as a center of dedicated patient care, united in a common commitment to excellence.
Revenue growth trend continues

SEHA’s most important financial performance indicators maintained an upward trend, meeting or exceeding targets.
This was particularly true of net patient revenue, which was well ahead of budget in the second half of 2011 and showed a significant increase on the same period of 2010, reflecting growing efficiency in SEHA’s ability to provide treatment within the available reimbursement mechanisms.

Inpatient admissions and outpatient visits were also up in the same period. Along with the favorable growth in admissions and visits, increased inpatient and outpatient revenue per admission reflected reduced claims denials and better collection patterns.

However, operating cost per adjusted patient day increased due to higher salaries, wages and benefits, and supply costs. This is partly due to compensation adjustments necessary to retain medical staff, having completed the Hewitt Project that realigned SEHA HR practices and salary scales across the board. Every SEHA employee now has a defined job and defined grade – a major achievement that will pay future dividends.

<table>
<thead>
<tr>
<th>Inpatient admissions</th>
<th>Outpatient visits</th>
</tr>
</thead>
<tbody>
<tr>
<td>3.7% ↑</td>
<td>4.2% ↑</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Net patient revenue</th>
<th>Outpatient revenue per visit</th>
</tr>
</thead>
<tbody>
<tr>
<td>57.4% ↑</td>
<td>9.4% ↑</td>
</tr>
</tbody>
</table>
In implementing the four-party (SEHA, HA-AD, DoF, and Daman) Note of Understanding, discussions are taking place with HA-AD/Daman to finalize activity and non activity-based funded mandates, and an application package has been developed for submission to HA-AD for the required approval of additional non activity-based mandates.

Transformation of revenue cycle management (RCM) systems has enabled a substantial improvement in performance for the year, with the value of claims submitted increasing and the proportion of denied claims falling.

Full-scale simulation at Al Rahba Hospital of the Physician Pay-for-Performance system – based on quality, outcomes, patient satisfaction, and productivity – will be followed by system-wide application.

---

Revenue Cycle Management

**Revenue Cycle Phases and Processes**

- Scheduling
- Registration
- Charge capture
- Coding and documentation review
- Claims processing
- Managed care contracting
- Denial management
- Payment posting
- AR follow up
- Patient collections
- Reporting and benchmarking
A costing function is now effective within Corporate Operations and has analyzed five areas of speciality services for three major hospitals as defined by HA-AD, while a cost of ownership study by the Supply Chain Department examined all aspects such as manpower cost, fixed cost, leased warehouses, and equipment. This is proving an excellent tool to determine which supply chain components should be outsourced or handled internally.

While these positive signs are encouraging, financial challenges continue in terms of productivity, outcomes management, and customer service delivery.

We have embarked on a three-year program to replace a number of ageing facilities. More contemporary features, allied to hotel-style levels of comfort, will ensure we attract and retain our customers.
OPERATIONAL

Awards underline quality achievement

The completion of SEHA’s fourth operational year was marked by receiving a number of distinguished awards for operational performance.
Chief among these was the European Award for Best Practices 2011 (Gold Category) in recognition of achievement in customer satisfaction and outstanding results in quality management. The award attests to SEHA’s commitment to improve its quality management system by implementing the European Society for Quality Research quality performance model.

Similar endorsement came from the Arab Hospital Federation with the Excellence Award for Development of the Arab Healthcare Sector and the Sheikh Khalifa Award for Excellence (Silver Level), while Mafraq Hospital was granted the Sheikh Khalifa Award for Excellence (Diamond) in healthcare, the first such institution to be so recognized in that category.

These awards demonstrate the progress being made towards SEHA’s desired outcomes, focusing on optimizing operational efficiencies, improving productivity, and effectively utilizing resources.
The advance to excellence is also evident in some significant ‘firsts’ achieved during 2011. These included the formation of a Medical Response Team comprising 34 doctors (ER, anesthesia, orthopedics, surgery) in line with governmental directives for SEHA to support other agencies’ field operations when needed.

A first-of-its-kind training project in emergency management and disaster medicine involved all stakeholders in Abu Dhabi and the UAE (governmental, semi-governmental, and NGOs) and about 950 trainees from SEHA, half of whom were UAE nationals.

Implementation of the productivity management program across all SEHA facilities is leading the development of standards for nursing, ancillary, and health clinic services, while the new Clinical System Review Plan is designed to deliver consistent quality in a range of disciplines such as psychiatry, tuberculosis management, obstetrics and gynecology, operating rooms and anesthesia, intensive care, rural medicine, and radiotherapy.
Completion and implementation of an accounts receivable subsidiary ledger across the enterprise is a key element of billing and ERP enhancement. All remittance advices from Daman now automatically create cash receipts, providing SEHA with the true picture of accounts receivable.

Further IT enhancements have included implementation of several Core Clinical Systems applications across a number of SEHA facilities and operational functions, from hospital information systems to financial administration.

Such initiatives represent the essence of ‘continuous improvement to recognized international standards’ and are the cornerstone of SEHA’s ceaseless efforts to be world-class.
LEADING THE WAY TO HEALTHCARE EXCELLENCE

In line with the Government’s restructuring strategy for healthcare provision across the Emirate of Abu Dhabi, SEHA (Abu Dhabi Health Services Company) was established in 2007 under the Guidance of HH Sheikh Khalifa Bin Zayed. SEHA evolved as an operator responsible for the overall provision of all public healthcare facilities, and HA-AD (Health Authority-Abu Dhabi), as a regulating body for the private and public healthcare sectors.

Vision
To provide our customers and communities with world-class healthcare.

Mission
To continuously improve customer care to recognized international standards

Values
SEHA is an ethical organization
Accountable, equitable, efficient, responsible, transparent.

SEHA is a patient-centered organization
Quality outcomes, comprehensive care, compassionate, culturally sensitive, respectful, reliable, accessible, affordable.

SEHA is an innovative organization
Research and education, partnerships and alliances, collaborative teamwork, empowered and satisfied staff.

Operating 12 hospitals, 62 ambulatory and primary healthcare centers, and two blood banks, with a combined total of more than 17,000 professional staff, SEHA’s operations expand across the entire Emirate of Abu Dhabi from the Western Region to the Eastern Region through the Middle and Island Regions. It is the largest healthcare network, providing a continuum of care to Abu Dhabi’s residents and utilizing leading-edge medical technologies. Its facilities accommodate more than five million outpatients annually, as well as approximately 100,000 inpatients and conducting about 41,000 surgeries.

In keeping with the Emirate of Abu Dhabi’s move to realize its potential as one of the top five governments in the world and becoming a world-class destination, the services offered by SEHA have to reach and maintain world-class standards. Accordingly, SEHA’s strategy since inception has entailed developing strategic partnerships with renowned international healthcare institutions such as Johns Hopkins, Cleveland Clinic, and VAMED to promote the adoption of leading medical practices and evidence-based medicine, while effectively leveraging knowledge transfer and professional development of UAE nationals towards building a sustainable healthcare system.

SEHA has to ensure that it delivers quality medical outcomes based on international benchmarks in a cost-effective and competitive manner as its dependency on Government block funding reduces and financial sustainability is achieved.

To succeed in its desired outcomes, SEHA will focus on optimizing operational efficiencies, improving productivity, and effectively utilizing resources within state-of-the-art facilities that are the cornerstones of SEHA’s integrated healthcare network.

SEHA’s strategies will also involve further developing its residency programs to achieve international standards, and promoting research initiatives, in line with the Government’s strategic direction to develop a talented healthcare workforce. SEHA will continue to develop and position regional centers of excellence in targeted medical areas such as Oncology, Cardiology, Neurology, and others, with a target of establishing eight such centers by 2016.

One of the primary global challenges in the healthcare sector is the shortage of skilled and experienced practitioners, nurses, and paramedics. This poses a greater challenge for SEHA in terms of attracting and retaining qualified healthcare professionals and administrators, especially UAE nationals. SEHA’s strategies focus on establishing an attractive workplace with competitive compensation benefits in line with regional and international market trends. To improve Emiratization targets, SEHA will closely coordinate with the education sector and key stakeholders in line with its Emiratization strategy as it embarks on pursuing excellence in healthcare delivery.
SEHA’s operational model has two primary components: Corporate Office and Business Entities (BEs). The Corporate Office aligns the strategic plans and objectives of the BEs with those of the company as a whole and comprises:

**SEHA Corporate Office**
- The Chairman’s Office
- Internal Audit
- The Office of the Managing Director, which includes Corporate Affairs and Legal
- Office of the CEO, which includes Corporate Marketing, Contracts Compliance, and Strategy and Performance Management
- Clinical Affairs and Clinical Quality
- Finance (including Mergers and Acquisitions and Revenue Cycle Management)
- Operations Management which, in addition to the office of the Chief Operations Officer, consists of Customer Care, Health/Safety and Environment, Business Development and Planning, and Disaster Preparedness
- Facilities and Construction which consists of Facility Development and Maintenance, and Facility Planning and Construction
- Information and Technology
- Support Services (including Human Resources)

SEHA Corporate Office sets direction for our Business Entities and assists with the performance of each. Each SEHA hospital is now a separate BE responsible for its own key performance indicators and its own budget, monthly financial reporting, and clinical operations. SEHA Corporate Office leads the development of initiatives or projects that concern all BEs such as HR policies, IT/HIS infrastructure, clinical guidelines, legal matters, and group purchasing.

**SEHA Business Entities**
- Sheikh Khalifa Medical City (including associated clinics and Abu Dhabi Blood Bank)
- Corniche Hospital (and associated clinic)
- Mafraq Hospital (and associated clinics)

**SEHA Dialysis Services**
- Al Rahba Hospital
- Tawam Hospital (including Al Ain Regional Blood Bank, associated clinics, and Al Wagan Hospital)
- Al Ain Hospital (and associated clinics)
- Al Gharbia Hospitals (six hospitals and several clinics in the West)
- 62 ambulatory and primary healthcare centers

**SEHA partners**

SEHA partners are critical to our successful operation and have an instrumental role in knowledge transfer, education, and promoting healthcare.

To achieve our goals with competitive advantage, SEHA partners with internationally recognized organizations that have extensive experience in healthcare delivery and research. While SEHA owns and operates the Business Entities, we entrust their day-to-day management to our international partners through management services agreements.

These partners include:
- Johns Hopkins Medicine International (Tawam, Al Rahba, and Corniche Hospitals)
- Cleveland Clinic Foundation (SKMC)
- VAMED and the Medical University of Vienna (Al Ain Hospital)
- Fresenius Medical Care (SEHA Dialysis Services)

The management services agreements specify the deliverables expected of each partner and help define partners’ relationships with SEHA. Our partners are not only involved in the successful operation of the Business Entities but provide knowledge transfer, education, clinical guidance, and the promotion of healthcare practice, including laying the groundwork for future medical research at SEHA facilities.

---

**KPIs may be monitored using business intelligence techniques to assess the present state of the business and to assist in prescribing a course of action. The act of monitoring KPIs in real time is known as business activity monitoring (BAM). KPIs are frequently used to ‘value’ difficult-to-measure activities such as the benefits of leadership development, engagement, service, and satisfaction. KPIs are typically tied to an organization’s strategy using concepts or techniques such as the Balanced Scorecard.**

For healthcare, KPIs can be associated with population health – such as the health of communities in individual emirates in the UAE. They can be leading or lagging indicators, pointing to structural and process assets, or they can be related to outcomes. There are many official sources of KPIs that should be adhered to in benchmarking performance, so that the definitions used will have international credibility (ie, Generally Accepted Accounting Principles, or the American Healthcare Informatics Management Association).

**How is a partner’s performance measured?**

We measure our partner’s performance through Key Performance Indicators (KPIs) – an accepted measure of performance commonly used to help an organization define and evaluate how successful it is, typically in terms of making progress towards its long-term organizational goals. KPIs can be specified by answering the question: “What is really important to different stakeholders?”
Since inception, SEHA has worked to an evolving series of strategic objectives that are fundamental to achieving the company’s long-term objective of establishing world-class standards of healthcare in every aspect of its operations.

SEHA is therefore pleased to report that the majority of its targeted initiatives for 2011, the first year in the new strategic plan, were met as planned with only a few exceptions due to minor changes in strategic direction.

<table>
<thead>
<tr>
<th>Perspective 1</th>
<th>Perspective 2</th>
<th>Perspective 3</th>
<th>Perspective 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Financial</td>
<td>Customers and Community Stakeholders</td>
<td>Service, Quality, and Operational Efficiency</td>
<td>Learning, Growth, and Infrastructure</td>
</tr>
<tr>
<td>Priority Area 1: Manage financial performance to achieve efficiency and competitiveness</td>
<td>Priority Area 2: Manage patients’ and stakeholders’ expectations effectively</td>
<td>Priority Area 3: Provide integrated high-quality and patient-centered services</td>
<td>Priority Area 5: Establish SEHA among the UAE employers of choice</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Priority Area 4: Deliver superior operational execution</td>
<td>Priority Area 6: Develop national leadership and support Emiratization</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Priority Area 7: Develop infrastructure to achieve world-class standards</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Priority Area 8: Promote research and education</td>
</tr>
</tbody>
</table>

For the 2011 plan, 10 of the original KPIs for the year were redefined or eliminated. Primarily, this flowed from SEHA’s ongoing commitment to improving strategic focus and ensuring accurate alignment with Abu Dhabi Executive Council’s Strategic Plan, itself a dynamic instrument that adjusts to changing priorities.

Business circumstances were also a factor, causing some KPIs to be adjusted or redefined due to financial issues. The change in KPIs also impacted on some 2011 initiatives – 19 of the original 50 being adjusted or removed because they no longer corresponded with SEHA’s overall strategies or those of the Executive Council.

The quest for world-class healthcare for our customers and communities is dynamic. Targets are set and reviewed quarterly and some adjustments are inevitable. Business planning demands not only a review of current strategies, KPIs, and initiatives: it also requires constant re-examination and re-evaluation of our strategic alignment with the Executive Council and Health Authority-Abu Dhabi.

This re-examination has resulted in a new, updated and revised 2012-2016 plan that was still being finalized as this report went to press.

This updated plan continues to be based on our original four perspectives and eight priority areas, but includes seven new KPIs and three new initiatives. Individual Business Entities are adjusting their KPIs and initiatives for their respective organizations as the changes cascade through SEHA. The new specific targets will be published in the first quarter of 2012 and reported in the HA-AD Report H1, 2012.

These objectives now extend to very specific areas of activity for each Business Entity and every division of SEHA Corporate, monitored against detailed key performance indicators.

Such metrics give management an intimately detailed picture of day-to-day performance and progress towards the ultimate goal, enabling corrective measures to be taken if necessary. In the broader context, SEHA conducts periodic reviews of accomplishments by Business Entities and Corporate Division, giving a more panoramic perspective of landmark achievements on the path to becoming a model of healthcare provision to the highest international standards.
A STRONGER FOCUS

SEHA continues to make notable progress in our quest to provide customers and communities with world-class healthcare. The past four years have seen significant advances in the planning and execution of systems and infrastructure upgrades. We have also made strides in business planning, with the alignment of our strategic plan with the goals of Health Authority-Abu Dhabi and the Abu Dhabi Executive Council in looking ahead to where we wish to be in the next five years.

Our financial systems now allow us to collect revenue, and regulations permit us to do business with other insurers. Our governance structure is improved, our human resources practices have been revised, and we have introduced strong education and research initiatives to help strengthen our delivery of healthcare services over that longer term. Emiratization – a key SEHA focus – is accelerating, and we are adding additional resources to this effort to improve even further.

Our emphasis is now even more strongly focused on quality, patient safety, and process improvement leading to better patient outcomes. More and more SEHA facilities are achieving the Gold Standard of JCI Accreditation. We now have strong data collection mechanisms so we can better measure our performance at all levels of the organization. With good data we can compare ourselves to established benchmarks in organizations already labeled ‘world-class’. So how are we faring in outcomes management?

In many areas the answer is “very well”, but to fully achieve our mission we still need to improve across the board. That is what our mission is about: continuous quality improvement to recognized international standards. Consequently, in 2012 we will begin more detailed reporting on clinical quality issues and outcomes using evidence-based medicine (EBM) standards.

The concept of EBM came to the fore in the early 1990s and has become a major driving force for many national healthcare organizations. The term has been defined as “the integration of best research evidence with clinical expertise and patient values”.

EBM advocates the use of up-to-date ‘best’ scientific evidence from healthcare research as the basis for making medical decisions. The three main advantages are:

• EBM offers the surest and most objective way to determine and maintain consistently high quality and safety standards in medical practice
• EBM can help speed up the process of transferring clinical research findings into practice
• EBM has the potential to reduce healthcare costs significantly

Some examples that show how SEHA is already on the right track with its application of EBM practice are:

AMI-1: Aspirin on arrival for acute myocardial infarction patient is at nearly 100% across the board for SEHA and at or above the USA benchmark.

HF-3: ACEI or ARB for LVSD is a treatment protocol for patients experiencing a certain kind of heart failure. Every SEHA location is near to or above the USA benchmark (see accompanying graphs).

SCIP-VTE-2 VTE: A surgical benchmark called prophylaxis given within 24 hours pre/post-surgery. Every SEHA location is at or above the USA benchmark.
It is not enough for us to just say that we are world-class; we will prove it by showing our ‘report card’ not only to our stakeholders but to our customers. Where we succeed, we will make sure we are constantly vigilant to maintain high standards; where we fall short, we will find ways to overcome our deficiencies.

That is the essence of ‘continuous improvement to recognized international standards’ and the cornerstone of SEHA’s ceaseless efforts to be world-class.

SEHA Business Entities specify the Quality/Patient Safety Core Measures that are used to reflect the levels of performance/improvements (in comparison with international standards and best practices).

Internationally recognized standards are selected from the following sources: Joint Commission core measures, Institute of Healthcare Improvement (IHI), Centers for Disease Control (CDC), and HEDIS for primary healthcare indicators. In 2011, Dialysis Clinical KPIs were introduced based on National Kidney Foundation (NKF – KDOQI) guidelines and World Health Organization.

Some examples of performance against international benchmarks are:

---

**SKMC Overall Mortality***

<table>
<thead>
<tr>
<th>Exemplary</th>
<th>Needs Improvement</th>
</tr>
</thead>
<tbody>
<tr>
<td>Observed Rate: 1.06%</td>
<td>Expected Rate: 1.29%</td>
</tr>
<tr>
<td>Pred. Obs. Rate: 1.24%</td>
<td>Odds Ratio: 0.93</td>
</tr>
</tbody>
</table>

American College of Surgeons National Surgical Quality Improvement Program (ACS NSQIP) is a risk-adjusted data collection mechanism that collects and analyzes clinical outcomes data. Participating hospitals use their collected data to develop quality initiatives that improve surgical care.

SKMC is one of two hospitals outside North America certified by the ACS NSQIP. SKMC receives two semiannual reports from ACS NSQIP comparing SKMC to more than 230 hospitals in the US. SKMC was close to the ‘exemplary’ range in the critical Overall Mortality* metric.

* Includes General and Vascular Surgery Cases
<table>
<thead>
<tr>
<th>AMI-1: Aspirin at arrival Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>USA Benchmark</strong></td>
</tr>
<tr>
<td><strong>Tawam</strong></td>
</tr>
<tr>
<td><strong>SKMC</strong></td>
</tr>
<tr>
<td><strong>Mafraq</strong></td>
</tr>
<tr>
<td><strong>Al Ain</strong></td>
</tr>
<tr>
<td><strong>Al Rahba</strong></td>
</tr>
<tr>
<td><strong>GMR</strong></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>HF-3: ACEI or ARB for LVSD Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>USA Benchmark</strong></td>
</tr>
<tr>
<td><strong>Tawam</strong></td>
</tr>
<tr>
<td><strong>SKMC</strong></td>
</tr>
<tr>
<td><strong>Mafraq</strong></td>
</tr>
<tr>
<td><strong>Al Ain</strong></td>
</tr>
<tr>
<td><strong>Al Rahba</strong></td>
</tr>
<tr>
<td><strong>GMR</strong></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>SCIP-VTE-2: VTE prophylaxis given within 24 hrs pre/post surgery Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>USA Benchmark</strong></td>
</tr>
<tr>
<td><strong>Tawam</strong></td>
</tr>
<tr>
<td><strong>SKMC</strong></td>
</tr>
<tr>
<td><strong>Mafraq</strong></td>
</tr>
<tr>
<td><strong>Al Ain</strong></td>
</tr>
<tr>
<td><strong>Al Rahba</strong></td>
</tr>
<tr>
<td><strong>GMR</strong></td>
</tr>
</tbody>
</table>
Key Performance Indicators, also known as KPI or Key Success Indicators (KSI), help an organization define and measure progress towards its goals.

Once an organization has analyzed its mission, identified all its stakeholders, and defined its goals, it needs a way to measure progress toward those goals. Key Performance Indicators are those measurements – quantifiable steps that reflect the critical success factors.

In SEHA’s case, KPIs have been defined to measure progress in every critical aspect of operations and how well the organization is succeeding in achieving its eight strategic priorities.

**Terminology explained**

Every business has key indicators of performance – a collection of figures and ratios that predict efficiency, performance, or problems. Healthcare has its own unique indicators, often expressed in technical terms that are peculiar to the business. Throughout this document you will find explanations of some of these indicators – in plain language – showing how we measure our performance against established industry benchmarks of excellence and quality.
### Inpatients

<table>
<thead>
<tr>
<th></th>
<th>Mafraq</th>
<th>Al Ain</th>
<th>SKMC</th>
<th>Tawam</th>
<th>WMR</th>
<th>Al Rahba</th>
<th>Corniche</th>
<th>AHS</th>
<th>SDS</th>
<th>SEHA Corp</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>ADC (Occupied Beds)</strong></td>
<td>244</td>
<td>282</td>
<td>562</td>
<td>321</td>
<td>86</td>
<td>102</td>
<td>156</td>
<td>1,753</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Occupancy %</strong></td>
<td>68.2%</td>
<td>77.0%</td>
<td>73.8%</td>
<td>75.5%</td>
<td>34.7</td>
<td>76.3%</td>
<td>65.3%</td>
<td></td>
<td></td>
<td></td>
<td>69.2%</td>
</tr>
<tr>
<td><strong>Inpatient Occupied Bed Days (A&amp;P)</strong></td>
<td>89,177</td>
<td>102,818</td>
<td>204,973</td>
<td>117,147</td>
<td>31,558</td>
<td>37,061</td>
<td>56,989</td>
<td>639,723</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Admissions</strong></td>
<td>16,051</td>
<td>19,958</td>
<td>17,533</td>
<td>22,843</td>
<td>7,685</td>
<td>8,019</td>
<td>15,400</td>
<td>107,939</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Discharges</strong></td>
<td>16,552</td>
<td>19,959</td>
<td>17,594</td>
<td>22,719</td>
<td>7,684</td>
<td>8,018</td>
<td>15,446</td>
<td>107,972</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>ALOS (occupied bed days per discharge)</strong></td>
<td>5.40</td>
<td>5.15</td>
<td>11.69</td>
<td>5.13</td>
<td>4.11</td>
<td>4.62</td>
<td>3.70</td>
<td>5.93</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>IP Surgery cases as a % of discharge</strong></td>
<td>35.9%</td>
<td>30.0%</td>
<td>33.5%</td>
<td>26.5%</td>
<td>23.8%</td>
<td>18.9%</td>
<td>24.0%</td>
<td>28.6%</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### Other utilization indicators:

- **Births**: 2,396, 2,441, 0, 4,407, 808, 1,841, 8,070, 19,963
- **Surgery Cases IP**: 5,920, 5,988, 5,868, 6,054, 1,829, 1,513, 3,695
- **Surgery Cases OP**: 2,589, 227, 1,377, 2,003, 1,779, 412, -
- **Surgery Cases Total**: 8,509, 6,215, 7,245, 8,057, 3,608, 1,925, 3,695

### Staff FTEs

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Total</strong></td>
<td>2,030</td>
<td>2,010</td>
<td>3,865</td>
<td>3,273</td>
<td>1,201</td>
<td>739</td>
<td>1,243</td>
<td>1,838</td>
</tr>
<tr>
<td><strong>Doctors</strong></td>
<td>378</td>
<td>318</td>
<td>645</td>
<td>551</td>
<td>215</td>
<td>113</td>
<td>130</td>
<td>294</td>
</tr>
<tr>
<td><strong>Nurses</strong></td>
<td>805</td>
<td>815</td>
<td>1,454</td>
<td>1,146</td>
<td>399</td>
<td>288</td>
<td>465</td>
<td>674</td>
</tr>
<tr>
<td><strong>Paramed</strong></td>
<td>355</td>
<td>324</td>
<td>657</td>
<td>579</td>
<td>229</td>
<td>99</td>
<td>85</td>
<td>367</td>
</tr>
<tr>
<td><strong>Administrative</strong></td>
<td>493</td>
<td>553</td>
<td>1,109</td>
<td>997</td>
<td>358</td>
<td>239</td>
<td>564</td>
<td>503</td>
</tr>
</tbody>
</table>

### Staff-Employee Count

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Total</strong></td>
<td>2,101</td>
<td>2,047</td>
<td>3,664</td>
<td>3,384</td>
<td>1,246</td>
<td>693</td>
<td>1,183</td>
<td>1,547</td>
</tr>
<tr>
<td><strong>Doctors</strong></td>
<td>374</td>
<td>326</td>
<td>556</td>
<td>570</td>
<td>222</td>
<td>103</td>
<td>130</td>
<td>244</td>
</tr>
<tr>
<td><strong>Nurses</strong></td>
<td>799</td>
<td>827</td>
<td>1,474</td>
<td>1,134</td>
<td>437</td>
<td>277</td>
<td>443</td>
<td>579</td>
</tr>
<tr>
<td><strong>Paramed</strong></td>
<td>271</td>
<td>215</td>
<td>510</td>
<td>489</td>
<td>148</td>
<td>70</td>
<td>58</td>
<td>261</td>
</tr>
<tr>
<td><strong>Administrative</strong></td>
<td>657</td>
<td>679</td>
<td>1,124</td>
<td>1,191</td>
<td>439</td>
<td>243</td>
<td>552</td>
<td>463</td>
</tr>
</tbody>
</table>

### Outpatients

#### Total OP Visits, all Services (excl DPSC)

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Total</strong></td>
<td>512,213</td>
<td>463,286</td>
<td>796,084</td>
<td>735,641</td>
<td>336,967</td>
<td>156,600</td>
<td>122,740</td>
<td>1,001,222</td>
<td>84,760</td>
<td>4,209,513</td>
<td></td>
</tr>
<tr>
<td><strong>Primary Healthcare Visits</strong></td>
<td>224,373</td>
<td>157,696</td>
<td>317,228</td>
<td>254,323</td>
<td>41,860</td>
<td>-</td>
<td>21,005</td>
<td>1,001,222</td>
<td>-</td>
<td>2,017,707</td>
<td></td>
</tr>
<tr>
<td><strong>Hospital Clinic Visits</strong></td>
<td>186,722</td>
<td>210,745</td>
<td>304,147</td>
<td>346,268</td>
<td>189,869</td>
<td>81,712</td>
<td>77,951</td>
<td>-</td>
<td>84,760</td>
<td>1,482,174</td>
<td></td>
</tr>
<tr>
<td><strong>Emergency Room Visits</strong></td>
<td>101,118</td>
<td>94,845</td>
<td>174,709</td>
<td>135,050</td>
<td>105,238</td>
<td>74,888</td>
<td>23,784</td>
<td>-</td>
<td>-</td>
<td>709,632</td>
<td></td>
</tr>
</tbody>
</table>

### Inpatient Volumes

<table>
<thead>
<tr>
<th></th>
<th>2010 Actual</th>
<th>2011 Actual</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Admissions</strong></td>
<td>104,085</td>
<td>107,939</td>
</tr>
<tr>
<td><strong>Patient Days</strong></td>
<td>652,604</td>
<td>639,723</td>
</tr>
<tr>
<td><strong>ALOS</strong></td>
<td>6.27</td>
<td>5.93</td>
</tr>
</tbody>
</table>

### Outpatient Volumes

<table>
<thead>
<tr>
<th></th>
<th>2010 Actual</th>
<th>2011 Actual</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>ER Visits</strong></td>
<td>638,280</td>
<td>709,632</td>
</tr>
<tr>
<td><strong>AHS/PHC (excl DPSC)</strong></td>
<td>1,987,577</td>
<td>2,017,707</td>
</tr>
<tr>
<td><strong>Hospital Clinic Visits</strong></td>
<td>1,414,497</td>
<td>1,482,174</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>4,040,354</td>
<td>4,209,513</td>
</tr>
</tbody>
</table>

### Emiratization

<table>
<thead>
<tr>
<th></th>
<th>2010 Actual</th>
<th>2011 Actual</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Physicians</strong></td>
<td>19.40%</td>
<td>20.50%</td>
</tr>
<tr>
<td><strong>Nurses</strong></td>
<td>1.10%</td>
<td>1.30%</td>
</tr>
<tr>
<td><strong>Other Clinical</strong></td>
<td>8.00%</td>
<td>8.40%</td>
</tr>
<tr>
<td><strong>Administration</strong></td>
<td>35.50%</td>
<td>38.90%</td>
</tr>
<tr>
<td><strong>Total Employed FTEs</strong></td>
<td>15.30%</td>
<td>17.00%</td>
</tr>
</tbody>
</table>
The SEHA Circle of Excellence Leadership Awards recognize leadership among our peers in the operational arena: those individuals who have embraced the SEHA mission, vision, and values to become one of the most notable healthcare organizations in the community of nations and a truly world-class healthcare organization.

SEHA Circle of Excellence Awards – 2011 Winners

Support Services
Paul Martin
Sr Human Resource Director
Corniche Hospital

Technology
Mohamed Al Hameli
Chief Information Officer
Ambulatory Healthcare Services

Facilities Management
Hamad Al Ahbabi
Facilities Manager
Tawam Hospital

Operational
Steven Matarelli PhD
Chief Operating Officer
Tawam Hospital

Nursing and Clinical Administration
Gail Smith
Chief Nursing Officer
Mafraq Hospital

Medical and Quality
Judy Lee MD, MPH, MBA,
Chief Medical Officer
Corniche Hospital

Financial
Saeed Al Kuwaiti
Chief Financial Officer
Tawam Hospital

Executive
Gregory Schaeffer
Chief Executive Officer
Tawam Hospital

Rising Star
Zulaikha Al Hosan
Assistant Director of Nursing
Mafraq Hospital

Business Entity of the Year
Tawam Hospital

The nominating committee comprises the six SEHA corporate division chiefs plus the CEO and Chairman. The nominations are narrowed to two in each category and then the committee votes on the winner. The winners are announced at the awards celebration and recognized for their achievement with a certificate, trophy, and a cash award.

Tawam Hospital was the big winner at the 2011 Circle of Excellence Awards, being nominated in six categories and coming top in five. Corniche and Mafraq took two awards each, with one going to AHS.
SEHA accomplishments are significant and are fully detailed in this report. They cover all aspects of our business including healthcare services delivery, financial results, clinical quality, operations, human resources, and information systems. Some highlights of our achievements in 2011 are:

- Clinical Imaging-Radiofrequency at Tawam is the first of its kind in the Middle East.
- Mafraq received the Diamond Award at the Sheikh Khalifa Excellence Awards Ceremony.
- Al Ain performed three total hip replacements and one total knee replacement.
- AHS received the Arab Health Award for Electronic Medical Records.
- HA-AD granted licenses for all nine SEHA Dialysis Services locations.
- Mafraq won the International Business Award as top customer service team.
- Tawam won Excellence in Laboratory Services at the Arab Health Awards.
- Madinat Zayed and Mafraq achieved JCIA accreditation.
- SKMC performed 271 open heart surgeries as well as 12 kidney and 33 corneal transplants.
Quarterly Joint Service Review meetings review performance criteria and assess performance of Business Entities to provide ongoing communication and guidance. Quarterly meetings of the Steering Committees also review overall BE activities, assess performance, and provide communication and guidance.

Key accomplishments at individual businesses are illustrated on the following pages.
Achievements in 2011

- Implementation of an electronic incident reporting mechanism has improved patient safety by reducing the average processing time of an incident event from 15 days to five.
- The ease of use and clarity of processing channels has resulted in increased reporting that supports the hospital's 'blame-free' incident culture.
- To promote Emiratization, Al Ain has signed a Futures Program MoU with Tawteen.
- Increased utilization and complexity of OT is evident in having performed three total hip replacements and one total knee replacement.
- In developing infrastructure to achieve world-class standards, the renovated Ob/Gyn ward has been opened.
- The Retinal Surgery Program has introduced an optical coherence tomography (OCT) service, having installed Callisto Eye & Forum and commissioned Intra Ocular Lens (IOL) Master.
- The hospital successfully organized the International Radiology Conference in April.
- Al Ain was named ‘Hospital of the Year’ among all SEHA Business Entities, the first time it has achieved this distinction.
- The National Leadership Development program is preparing Emiratis for executive positions. The program was initiated with 28 Emirati staff who took part in specific project work, workshops, evaluation, and an on-site experience in Vienna in preparation to be the future leaders of the organization.
- Launch of an acute pain service aims to alleviate post-operative pain, trauma pain, labor pain, and other types of acute pain unmanageable by analgesic means.
- Central Unit Dose (CUD) medication system has been extended to 95% of patients. This program will not only increase medication safety but also reduce medication errors and wastage.
- The Integrated Diabetic Foot program has been implemented in conjunction with the orthopedic surgeon and the tissue viability team. Other specialists such as the vascular specialists and endocrinologists are consulted as necessary.
Hypodermic Syringes

493,000

Discharges

19,959

Inpatient surgery cases

5,988

Staff (FTEs)

- Doctors: 28%
- Nursing: 41%
- Paramed: 16%
- Administration/support: 16%

Outpatients

- Primary healthcare visits: 34%
- Hospital clinic visits: 45%
- Emergency room visits: 20%
Sheikh Khalifa Medical City (SKMC)

Background
Sheikh Khalifa Medical City (SKMC) is a flagship institution of the SEHA HealthSystem. It provides a comprehensive array of services through its sophisticated network of hospitals, primary healthcare centers, and specialist clinics.

SKMC’s staff numbers more than 3,865. It has total capacity of 764 beds and offers a wide variety of medical and surgical treatments and diagnostic facilities.

A founding objective of SKMC was to provide an international standard and style of care so that people would no longer need to travel abroad for medical treatment. Today SKMC operates under the management of Cleveland Clinic, one of the most respected US hospital groups. The institution has three major facilities – Sheikh Khalifa Hospital, Abu Dhabi Rehabilitation Center, and the Behavioral Science Pavilion – situated in one complex at the heart of the capital city, as well as an impressive network covering Abu Dhabi Island and comprising 14 outpatient clinics, seven primary healthcare centers, and two dental clinics.

The SKMC team includes around 645 physicians (170 consultants), 657 paramedics, 1,454 nurses, and 1,109 administrative personnel. On average, 1,460 admissions are handled every month as well as 66,340 outpatient visits and roughly 14,560 emergency and urgent care visits. About 600 general surgical procedures are carried out each month, as well as some 2,000 scans and 3,300 dialysis treatments and peritoneal runs.

Achievements in 2011

- The SKMC Laboratory has become the first in Abu Dhabi to be accredited by the College of American Pathologists, after successfully passing the CAP inspection.
- SKMC cardiac consultants and specialists saved the life of a 32-year-old local man by using extra corporal circulation (ECC) including deep hypothermia to open the chest safely. Therapeutic hypothermia is a procedure that is often used to stop brain damage in patients who suffer cardiac arrest, where the treatment involves lowering a patient’s body temperature to slow the brain’s demand for oxygen, thereby preventing damage to cells.
- Implementation of Patient Education Resource Center by Ebsco (an online scientific database) has created an electronic patient education tool that greatly improves the written instructions given to patients before a procedure and at discharge.
- To boost efficiency and competitiveness, a Nurse Vaccination Clinic was implemented at Al Manhal Family Medicine Clinic to optimize patient access and physician productivity.
- Provision of integrated high-quality and patient-centered services was underlined by recording zero ventilator-associated pneumonia in D0 ICU over a four-month period. SKMC also performed its 150th bariatric surgery case.
- SKMC achieved JCI re-accreditation during the year.
- In pioneering state-of-the-art medical and surgical procedures, SKMC surgically implanted vagus nerve stimulation under the skin of the chest, much like a pacemaker, attached to the vagus nerve in the lower neck. This offers many benefits to epilepsy patients. Those who have undergone this surgery at SKMC enjoyed 60-70% reduction of their seizures, with two gaining almost complete freedom from seizures.
- The Pediatric Cardiac Surgery has successfully performed more than 900 operations since it was inaugurated in 2007. Of these, 288 were highly delicate and demanding open heart surgeries.
- For adults seeking critical medical recourse in cardiology, 271 open heart surgeries were also performed during 2011.
- Minimally invasive vein harvesting for coronary artery bypass grafting surgery is now available at SKMC – an outstanding method and the first of its kind in the UAE.
- SKMC performed 12 kidney transplants and 33 corneal transplants in 2011.
- A UAE first is the treatment modality for the neurosurgical procedure of Deep Brain Stimulation – a surgical procedure implanted in the brain to improve the quality of life for patients with Parkinson’s disease. The new technique is completely reversible and fully programmable.
- SKMC successfully conducted CT Fluoroscopic Guided Cervical Epidural Injection – a treatment for local spinal or cervical pain and radiculopathy – for the first time in the Middle East.
- In co-operation with Corniche Hospital, SKMC has launched the fetal neuro clinic – the first of its kind in Abu Dhabi to offer multi-disciplinary services of experts in prenatal medicine.
Lab tests

1,540,101

Inpatient occupied bed days

204,973

Inpatient surgery cases

5,868

Staff (FTEs)

Outpatients

- Doctors
- Nursing
- Paramed
- Administration/support

- Primary healthcare visits
- Hospital clinic visits
- Emergency room visits
Background
Tawam Hospital was built in 1979 as a 227-bed referral and acute care general hospital to serve the entire UAE. Since then, growth has been uninterrupted and the hospital now has 445 beds available for use. It has been managed since early 2006 by Johns Hopkins Medicine International and provides comprehensive tertiary care for patients in Abu Dhabi's Eastern Region.

In addition to the main hospital close to Al Ain’s city center, Tawam manages four satellite facilities: Tawam Dental Center, Neima Primary Healthcare Clinic, Al Jahli Primary Healthcare Clinic, and Al Wagan Hospital, which is located 65 km south of Al Ain. Al Wagan Hospital is a primary care and critical access hospital with two five-bed wards, ambulatory treatment clinics, general dentistry facilities, and a critical access emergency department.

Tawam anchors advanced patient care, highly complex surgical and interventional cardiac procedures, and trauma-level emergency services. A professional staff of 3,273 includes more than 551 physicians, 1,146 nurses, and 579 paramedics, supported by about 997 administrative personnel. They work in seven operating theaters, six general and one C-section suites, and 18 wards with additional ambulatory treatment clinics and an emergency department.

More than 15 percent of all staff are UAE nationals. As well as being a tertiary teaching hospital, Tawam has inpatient, VIP, and royal care facilities; a polyclinic housing specialty referral centers, medical library, and education and training resources; a radiotherapy building with a palliative care inpatient ward, new ambulatory chemotherapy and oncology clinics, and two linear accelerators; and a breast cancer center providing comprehensive breast cancer services including mobile imaging.

In total, Tawam Hospital conducts more than 8,000 surgical procedures every year, ranging from general surgical to highly specialized orthopedic, neurology, gynecology, trauma, and head and neck surgery. Births number close to 4,400 annually and more than 28,880 dialysis treatments are carried out.

Achievements in 2011

- Oncology Services have been enhanced by successful commissioning of tomotherapy—currently treating up to eight cases a day, and opening the new state-of-the-art Oncology Pharmacy Room.
- Enhancement of Oncology Services has led to a reduction in the waiting list for radiotherapy treatment by extending working hours and implementing hypofractionation scheduling for breast patients who qualify for this regime.
- Further Oncology advances include operation of the first new IX Varian Linear Accelerator that has been installed in ‘600C’ bunker. Extended working hours have reduced the waiting list to about 24 days and the number of patients on the waiting list from 36 pending non-emergency cases, to only nine cases.
- Tawam has recorded a national ‘first’ by receiving accreditation from the World Federation of Hemophilia as the main treating center for pediatric hemophilia in the UAE. Tawam treats patients from all emirates (with coverage for non-Abu Dhabi residents under the approved activity-based mandates).
- Tawam received several awards and recognitions for quality improvement and service excellence, collecting five of the nine awards conferred by the SEHA Circle of Excellence, including Business Entity of the Year. Five individuals at Tawam also received recognition. Tawam also took Gold in SEHA’s Quality Improvement Transformational Events awards.
- At the Arab Health Awards, Tawam won ‘Excellence in Laboratory Services’ and was shortlisted in three more categories.
- The first discectomy procedure was conducted, as well as the first percutaneous disc decompression procedure in the Outpatient Pain Clinic.
- Trans-cranial Doppler was introduced for patients with sickle cell disease, while the chronic peritoneal dialysis program was re-established.
- In pediatric surgery, the first emergency closure of neonatal bladder extrophy with bilateral iliac posterior osteotomy was undertaken with excellent result.
- Neurosurgery conducted the first surgical correction procedure for severe idiopathic scoliosis deformities, performed with a visiting orthopedic surgeon.
Inpatient occupied bed days
117,147

CT MRI scans
18,956

Teeth extracted
5,000

Staff (FTEs)

Doctors 30% 35%
Nursing 18% 17%
Paramed 18%
Administration/support 30%

Outpatients

Primary healthcare visits 18%
Hospital clinic visits 35%
Emergency room visits 47%
Achievements in 2011

- To maintain the focus on ensuring patient-centered care, Rehabilitation Department acquired Balance Master – a state-of-the-art technology used to assess and treat patients with balance deficits of neurological, visual, and musculo-skeletal origin.
- Daman denial rates decreased following changes to work process in August 2010, and implementation of Level 1 review/audit of OPD claims before submission.
- The newly developed Tamkeen Program for newly recruited UAE nationals is designed to support national leadership and Emiratization while increasing the number of Emirati staff.
- Purchase of a ‘Symphony Integrated Library Automation System’ (SILAS) is contributing to making Mafraq a hospital of choice in the Middle Region. The system includes hundreds of the latest edition e-books and full-text journals.
- Pharmacy achieved significant savings through short expiry replacement by vendors and liquidation to other hospitals.
- The Special Care Baby Unit opened with 11-bed capacity for Level 1 acuity patients. The service was previously accommodated in NICU in four beds, encroaching on Level 2 and 3 patients.
- Mafraq achieved JCI accreditation following the final survey visit. Overall compliance with JCI standards was rated at 97.3% in Q4.
- Mafraq won the Gold Award in the second cycle of SEHA Transformation Events, reflecting how transformation of patient access service enhanced patient experience and supported the organization’s goals.
- A dedicated Hypertension Clinic was launched in Q4 to support the two in five UAE nationals estimated to suffer from the disease.
- SEHA announced in October that Bumrungrad International would not renew its management services agreement at Mafraq Hospital and would terminate management of the business at the end of 2011. Mafraq management worked with SEHA Corporate to coordinate a transition plan with management staff at Mafraq to assume direct day-to-day management of the hospital and its related clinics from December 31, 2011.

Background

Mafraq Hospital was established in 1983 and was at that time the largest tertiary referral treatment hospital in the UAE. Situated just south of Khalifa City, Mafraq is one of Abu Dhabi Emirate’s principal trauma centers and home to the UAE’s only burns unit the hospital provides a wide range of surgical specializations, as well as critical care services. It also operates two primary healthcare clinics, Al Nadyha and Baniyas.

Surgical procedures include orthopedics, general surgery, the neurosciences, vascular, thoracic, pediatric, plastics, cardiovascular, and ENT/maxillofacial, as well as general medicine such as cardiology and gastroenterology, general obstetrics, and pediatric care. Critical care extends to cardiac and general intensive care, neonatal intensive care, and the specialist Burns Unit.

Mafraq has bed capacity for roughly 451 patients, cared for by a professional staff of almost 2,000.

The hospital treats close to 512,000 patients each year and conducts about 8,500 operations.
Inpatient occupied bed days
89,177

Admissions
16,501

Total surgery cases
8,509

Staff (FTEs)

- Doctors: 24%
- Nursing: 40%
- Paramed: 17%
- Administration/support: 19%

Outpatients

- Primary healthcare visits: 44%
- Hospital clinic visits: 36%
- Emergency room visits: 20%
Achievements in 2011

- Corniche Hospital was granted HA-AD approval for a new residency program in obstetrics and gynecology to train Emirati medical doctors. Corniche will participate in HA-AD’s Tanseeq residency matching application system. The program will increase the number of qualified Emirati doctors specializing in obstetrics and gynecology, and address the long-term healthcare needs in the UAE. It will be led by Dr Judy Lee, MD, CH – chief medical officer and assistant professor at the Johns Hopkins University School of Medicine, and Dr Maggie Blott, MD, CH – chief academic officer and former vice-president for the Royal College of Obstetrics and Gynaecology in the United Kingdom. Corniche’s first entry to the Tanseeq residency program has resulted in being matched with two candidates, one of whom is a UAE national.

- Midwifery training began in partnership with the Higher College of Technology in Abu Dhabi. The program is the first in Abu Dhabi and will help alleviate the enormous shortage in qualified personnel, aiming to recruit and develop Emirati midwives for the future. The curriculum has received formal approval from the Johns Hopkins School of Nursing and 10 students are already enrolled, including three UAE nationals. These students will complete the 18-month program in July, 2012.

- The third and final phase of the renovation of the Neonatal Intensive Care Unit was completed. The project took more than a year and increased the number of beds from 50 to 64. Corniche Hospital remains the largest and busiest NICU in the UAE and provides tertiary care to babies from around the country.

- The Research Ethics Committee (REC) was established in accordance with HA-AD’s governing polices and received HA-AD approval. A clear mission was developed and focuses on specific objectives:
  - encourage and support the pursuit of high-quality clinical research
  - promote the discovery and dissemination of new knowledge
  - advocate on behalf of patients involved in clinical research
  - engender a spirit of scholarly activity among physicians and nurses and other healthcare providers involved in research
  - promote and support the development of resources

Background

SEHA took over Corniche Hospital in 2008, installing a new management team. Since then, all operational systems have been updated or replaced. The transition, as with all organizational change, was not without its attendant challenges, but the end result has more than justified the process. Corniche is now a model of modern healthcare management, building on 25 years of proven excellence.

Located in downtown Abu Dhabi, Corniche is the UAE’s leading referral hospital for obstetric and neo-natal care. With specialty clinics dealing with lactation, fetal medicine, obstetric medicine, and VIP patient education, the hospital can handle up to 256 patients at a time and has facilities for 50 intensive care cases.

Corniche is managed by Johns Hopkins Medicine International. It has a professional staff of about 1,250 who manage an average of 1,300 admissions every month, as well as roughly 2,000 emergency cases and as many as 10,500 outpatient visits. Six wards, six VIP rooms, and three royal suites are complemented by three surgical theaters, 14 delivery rooms, an urgent care department and an outpatients unit.
Admissions
15,400

Births
8,070

Inpatient surgery cases
3,695

Staff (FTEs)

- Doctors: 45%
- Nursing: 37%
- Paramed: 10%
- Administration/support: 7%
Introduction of the innovative ‘Hugs and Kisses’ infant-tagging system ensures the safety of babies born at the hospital. Corniche is the first medical center in Abu Dhabi to adopt the system that comprises a bracelet which is slipped onto an infant’s ankle at birth, with a corresponding tag on the mother’s wrist. Embedded technology assures that newborns are not moved from designated areas without authorization. Each time a baby is brought to his mother, the match is confirmed by an electronic signal. Mismatched tags trigger an alarm to alert staff members.

A new pilot program assesses patient experience in real time – the Patient Experience Executive Round (PEER). A senior admin officer will round on a number of patients and ask specific questions regarding their experience. The results from the pilot will be assessed and the program will be revised accordingly to be part of the hospital’s Patient Experience Plan for 2012.

A new mobile phone SMS service is being used to remind patients of their appointments at the outpatient clinics. Patients receive two reminder SMS messages in Arabic and/or English. The first is sent five days in advance and the second a day before the appointment.

Starting in 2008, SEHA committed to implementing Cerner Millennium as the Electronic Medical Record (EMR) system for patient documentation in all of its facilities. Corniche also committed to the Cerner system and set the goal of 100% adoption by the end of 2011. The ‘100%’ was defined as documenting all patient healthcare-related information in the EMR system, with the exception of fall-back on paper documents only when the information could not be captured in the EMR system. Corniche Hospital is now using 100 of the EMR system available.

Corniche held a special graduation ceremony to honor Dr Mariyam Noushad, MD – the first trainee from outside the United Kingdom to complete the Advanced Training Skills Module (ATSM) in maternal medicine. The hospital, along with the Royal College of Obstetrics and Gynaecology (RCOG), HA-AD, and SEHA also announced the first UAE national trainee inducted into the program.

The ATSM is a highly specialized program designed by the RCOG, providing the advanced sub-specialty skills required for best practice in maternal medicine.

Corniche organized the third annual Obstetric Medicine Conference held at the Sheraton Corniche in Abu Dhabi in November. Local and international speakers participated. More than 250 clinicians attended and heard speakers discuss the latest issues in obstetric medicine. Johns Hopkins expert Dr Michael Streiff took part in the conference as well as in follow-up educational activities at the hospital.
Inpatient occupied bed days
56,989

Lab tests
867,140

Ambulatory care clinic visits
86,303

Outpatients

- Primary healthcare visits: 19%
- Hospital clinic visits: 17%
- Emergency room visits: 64%
Background
Al Rahba Hospital is located on the northeast side of Abu Dhabi city on the main Dubai highway. It is an advanced secondary care hospital offering medical and surgical services, and is committed to continued development and investment in building a center of excellence.

Because of Al Rahba’s location just off the busy commuter route between Dubai and Abu Dhabi, it is the primary emergency room for road traffic accidents. It is not unusual for the hospital to receive multiple trauma cases after a major accident, the greatest number at any one time being more than 200 who were treated over a three-hour period following a chain reaction pile-up in 2008.

The hospital was opened in 2003 and, since July 2008, has been managed by Johns Hopkins Medicine International, one of the world’s most respected healthcare institutions. As well as serving community needs through curative expertise, the hospital operates a growing number of preventative programs to reduce chronic diseases such as diabetes and hypertension.

Al Rahba’s facilities include accident and emergency services, obstetrics and gynecology, maternity, dialysis, and neonatal intensive care. The hospital has 114 beds in seven wards and a professional staff of more than 700. On average, it deals with 13,000 emergency and outpatient visits every month, 650 inpatient admissions, and 150 operations, mainly gynecology, orthopedics, and general surgery.

Achievements in 2011
- Al Rahba has partnered with Chevrolet (General Motors) in a child injury prevention campaign, distributing 500 child car seats to parents of newborn babies. This is followed up with community sessions on child injury prevention at schools/women’s groups, as well as installing child injury prevention education booths at the hospital.
- Inauguration of the new Rheumatology Clinic has been followed by an average of 14 patient visits every day during operational hours. Currently, the clinic is open two days a week, offering treatment for various disorders of the musculo-skeletal system.
- A total of 52 patients were received at Al Rahba Hospital following the Al Samha mass casualty in April involving many vehicles in two road accidents on the Abu Dhabi-Dubai highway. The hospital emergency plan was activated by the incident commander and all patients were discharged without any fatality.
- High scores were achieved in all areas assessed by the patient satisfaction survey, inpatient department achieving 90.2% and ranking best among all SEHA facilities; outpatient department – 85.9%, and accident and emergency – 86.5%, both ranking second among all SEHA facilities.
- Expansion of ICU and NICU facilities added 27 new rooms (10 ICU, 17 NICU), as well as two family rooms for relatives of critical care patients; and two new VIP suites and a playroom for children.
- Growth in patient volumes is reflected in the number of OPD visits in 2011, totaling 80,898 and increasing in key areas such as OPD medical clinic – 11,768 (+26%), endocrinology/diabetes care clinic – 1,804 (+919%), and nephrology clinic – 1,227 (+28%). The total number of ED visits was 77,341 (+9%), and the total number of admissions 8,002 (+5%).
- Outpatient pharmacy resumed full 24/7 coverage and as a result the waiting time has dropped from an average of 22 minutes to 11 minutes. Further service improvements included the opening a new coffee and flower shop and the distribution of comfort kits to all inpatients.
- Al Rahba hosted the second National Women’s Health Conference in November. The two-day event brought together more than 800 healthcare professionals and regulatory authority members.
Surgical masks
140,055

Discharges
8,018

Total surgery cases
1,925

Staff (FTEs)

Doctors 15%
Nursing 39%
Paramed 13%
Administration/support 32%

Outpatients

Hospital clinic visits 48%
Emergency room visits 52%
Background

Al Gharbia Region comprises six hospitals and four primary healthcare centers serving the Gharbia Region and the remote western areas of Abu Dhabi. Two are as far away as 350 km from the UAE capital, and the closest are still 160 km distant from Abu Dhabi city.

Madinat Zayed Hospital

Located in Madinat Zayed, about 160 km from Abu Dhabi city, Madinat Zayed Hospital is the referral hospital in the region and the largest in Al Gharbia Region, providing medical services to its host town and surrounding catchment areas.

Originally built in 1982 as a 50-bed community hospital, it served the population of Madinat Zayed until 2000 when the ‘new’ hospital was inaugurated. It is now a 155-bed secondary hospital with some tertiary services, such as neonatology, cardiology, maxillofacial surgery, gastroenterology, and nephrology and dialysis.

The hospital is currently undergoing major extension and expansion.

A new Accident and Emergency Department, Obstetrics and Gynecology Ward, Royal and VIP Wards, Dialysis Unit, and Dental Center are planned to be operational next year. A new Endoscopy Unit is also planned.

Madinat Zayed Hospital has five general wards, two isolation wards, one labor ward, ICU with eight beds, a long-stay ward, four operating rooms, and a special-care baby unit.

Professional staff comprises 106 doctors, 17 specialist surgeons, and 212 nurses. Equipment includes high-resolution CT scan, fully automated blood chemistry analyzer, fibro-optic endoscopes, laparoscopes, stroboscopic unit for vocal cord study, audiology workstation, acoustic brain stem audiometry, and specialized instruments for microscopic as well as endoscopic ear surgeries. A mobile mammogram unit is already installed and will soon be operational.

The hospital provides round-the-clock accident, trauma, and emergency services as well as other routine services. Average daily attendance is about 300 outpatients and 40 inpatients. About 90 surgical operations are carried out every month, as well as handling 40 to 50 childbirths.

Ghiathy Hospital

The 30-bed Ghiathy Hospital, located 250 km from Abu Dhabi city, is the only secondary care facility in this remote area, providing medical services for the people of Ghiathy, Bida Mutawa, and Seer Bani Yas. Built in 1982, the hospital offers basic emergency services as well as specialized medical care in internal medicine, pediatrics, obstetrics and gynecology, general and orthopedic surgery, dermatology, ophthalmology, and dialysis. ENT service is planned imminently.

The hospital manages about 47,500 patients annually, cared for by a team of 22 doctors, two surgeons, 48 nurses, and 20 technicians and paramedics. About 570 operations are carried out every year.

Facilities include emergency services, endoscopy, ultrasonography, and physiotherapy as well as 11 specialist clinics.

Marfa Hospital

Marfa Hospital is a 28-bed rural community secondary hospital located 160 km west of Abu Dhabi city. Built in 1999, it provides emergency services as well as specialized medical care in internal medicine, pediatrics, obstetrics and gynecology, general and orthopedic surgery, dialysis, mother and child healthcare, and ENT.

Dermatology and ophthalmology services are planned next year.

Professional staff comprises 20 physicians and surgeons, 49 nurses, and 26 technicians and paramedics.

The Emergency Unit receives about 65 patients daily, while Ob/Gyn manages 10-15 deliveries monthly. Some 15-20 operations are conducted every month.

Al Sila Hospital

The 36-bed Al Sila Hospital is located 360 km west of Abu Dhabi city and 20 km from the border with Saudi Arabia, and serves as the main provider of medical care at the primary level for the community of Bay’a Al Sila and its immediate surroundings, comprising roughly 12,000 people.

Services include medical and general surgery, operating theater, dental care, outpatient department, maternal and child health, preventive medicine, school health, diagnostic and imaging services, and a 24-hour emergency department and pharmacy.

The total staff number 16 doctors, 40 nurses, 17 allied health, and 15 administrative personnel.

On average, 2,500 patients are treated each month at the main hospital and 11 specialist clinics. In 2011, 260 surgery cases were dealt with.

Dalma Hospital

Dalma Island lies about 30 km offshore to the extreme west of the UAE, and is only 45 km² in area. Dalma Hospital is the island’s only healthcare facility, providing emergency, acute, and wellness services to the 10,000 residents.

Built in 1984, the hospital has 22 beds, allocated across the emergency room, male and female wards, isolation rooms, intensive care, nursery, operation and delivery rooms, and outpatient clinics.

Services include general medicine and surgery, nephrology, pediatric medicine, ob/gyn, maternal and child health, and radiology.

Professional staff comprises 11 doctors (including two surgeons), 27 nurses, and 16 paramedics and technicians. Together, they care for more than 1,000 patients in an average month, as well as roughly 1,400 outpatients.

For services not available at Dalma, such as orthopedic, ophthalmology, and ENT, a formal arrangement has been established with Madinat Zayed Hospital to provide coverage at Dalma on specific days. Cooperation with Madinat Zayed also extends to a continuing educational program for Dalma’s nursing staff.

Liwa Hospital

Liwa Hospital is located in Liwa City, 195 km from Abu Dhabi city, and was inaugurated in July 2004. The hospital provides emergency as well as outpatient services in general medicine, pediatrics, and mother and child healthcare.

Professional staff comprises six doctors, two dentists, 19 nurses, and 15 medical technicians who care for 30-35 patients daily.
Inpatient occupied bed days
31,558

Discharges
7,684

Outpatient surgery cases
1779

Staff (FTEs)

- Doctors: 33%
- Nursing: 18%
- Paramed: 19%
- Administration/support: 30%
Achievements in 2011

- Infrastructure and resources at Marfa Hospital benefited from the opening of several clinics: Internal Medicine, Surgery, ENT, Pediatrics, Orthopedics, and Dental.
- Capacity at Marfa Hospital has increased by 18 beds as part of the Al Gharbia expansion plan.
- A recruitment trip to India resulted in 921 interviews and 417 short-listed candidates for medical, nursing, and paramedical positions.
- A proficiency-testing contract with CAP (College of American Pathologists) has been signed after approval by SEHA.
- Extensive efforts were devoted to improving documentation, coding, billing, collection, and denial management processes. A major achievement was to make the coding process more accurate and 100% concurrent.
- The quality system was expanded across all its facilities, especially at the clinical level. The plan is to get all AGH facilities accredited by JCIA. Madinat Zayed Hospital (MZH) achieved JCIA accreditation in September, paving the way for sister hospitals.
- All facilities made excellent progress in being prepared for any emergency. The quarterly audits performed by SEHA Operation Control & Command Center (OCCC) showed tremendous improvement in all AGH facilities, scoring 97%.
- Many clinical initiatives were introduced to help raise patient care to international standards, including outpatient management of diabetes, acute MI, sepsis, peri-operative surgical antibiotic prophylaxis, and DVT prophylaxis.
- Ophthalmology, dermatology, and ENT services were added to all Al Gharbia hospitals to improve accessibility to essential services in the region.
- Al Dhafrah Family Medical Center (DFMC) was established as a state-of-the-art facility for family-centered care.
- Ghiathy Hospital introduced comprehensive radiology services including digital radiography and digital cephalometry for dental radiography.
- Dalma launched similar comprehensive radiology services including a CT scanner and digital mammography for breast cancer screening.
- Marfa Hospital underwent complete renovation of its emergency department to international standards, adding new OP and ENT departments as well as dental and obstetrics clinics and wards.
- Al Sila Hospital introduced new comprehensive radiology services including digital radiography.
- All hospitals were approved by HA-AD to be centers for clinical research. In December, Al Gharbia won the first prize for oral presentation at the SEHA Research conference with a presentation by Dr Rodhan Khthir, medical director at MZH.
<table>
<thead>
<tr>
<th>Category</th>
<th>Data</th>
</tr>
</thead>
<tbody>
<tr>
<td>Admissions</td>
<td>7,685</td>
</tr>
<tr>
<td>Births</td>
<td>808</td>
</tr>
<tr>
<td>Hypodermic syringes</td>
<td>486,330</td>
</tr>
<tr>
<td>Outpatients</td>
<td></td>
</tr>
</tbody>
</table>

Outpatients distribution:
- Primary healthcare visits: 31%
- Hospital clinic visits: 12%
- Emergency room visits: 56%
2011 PERFORMANCE CONTINUED

Ambulatory Health Services

Background

The concept of ambulatory healthcare services is to provide a wide range of treatment and facilities for patients who are not admitted overnight to a hospital. These services are generally available at outpatient clinics, urgent care centers, emergency rooms, ambulatory or same-day surgery centers, diagnostic and imaging centers, primary care centers, community health centers, occupational health centers, mental health clinics, and group practices.

Advances in science and technology mean that the healthcare needs of most of the population can be managed at outpatient level. And with its extensive network of healthcare facilities, SEHA HealthSystem’s Ambulatory Healthcare Services (AHS) enables hospitals to focus on their core expertise of tertiary care management.

AHS operates more than 24 ambulatory and primary healthcare clinics, seeking to bridge the comprehensive healthcare facilities provided by Government hospitals and the personalized care and attention given by the private sector. The four AHS subsidiaries are Ambulatory Care Centers (ACCs), Disease Prevention & Screening Centers (DPSCs), School Health Services (SHS) and Mobile Clinic Solutions (MCS). School Health Services encompass 298 school clinics, higher education and university clinics, and a private schools’ vaccination program.

Healthcare prevention and education is also delivered in the outpatient environment through the widespread AHS facilities available throughout Abu Dhabi’s Middle and Eastern Medical Regions.

The Middle Region handles an average of 33,770 patient visits per month, with a professional staff of 116 physicians and 236 nurses and paramedics. Eastern Region averages 44,888 visits and has 117 physicians and almost 296 nurses/paramedics.

With 40 physicians and 160 nurses/paramedics, Disease Prevention and Screening deals with an average of 78,184 monthly visits.

About 80 percent of all AHS patient visits are primary care consultations with the balance being specialty consultations. Diabetes and cardiovascular disease comprise most of chronic disease cases managed in the clinic network.

Achievements in 2011

- An effective system for the management of chronic disease patients benefited from reworking the RFP document for the proposed Chronic Disease Management Program (CDM). Preparations have been made for re-establishing a new RFP evaluation committee to administer the CDM RFP tender process.
- AHS continued to work with HA-AD on program development for the upcoming Weqaya 2011 screening project.
- To ensure quality infrastructure and clinical outcomes, baseline JCI assessment of AHS clinic network began, using JCI Ambulatory Standards. JCI awareness sessions have been presented to more than 800 employees.
- Chronic Disease Management (CDM) conducted baseline assessment of current provision of service for chronic disease patients.
- In developing a robust Revenue Cycle Management system, AHS successfully received Evaluation & Management (E&M) certification by HA-AD for all of its clinics.
- AHS is now using survey data and patient feedback information to establish a current clinic experience baseline compared to patient expectations, with a view to improving customer relationship management to better manage and support patient encounters/patient-clinic interactions.
- Denials and rejections reduced from in 2010, contributing to a net revenue increase year-on-year.
- The Premarital Screening Program was implemented, as a HA-AD regulated and government mandated service covered for Thiqa and self-pay for non-Thiqa patients. The latter (non-national) number of patients amounted to about 4,000 while Thiqa patients totaled about 4,100.
- AHS received an Arab Health award for Electronic Medical Records in recognition of its 2010 performance.
- A new Diabetes Prevention Support Center was opened in Marfa in October, facilitating the community’s access to visa screening services.
- The 2010-2011 School Health Screening Program screened about 27,000 students in Grades 1, 5, and 9 in public schools.
Primary healthcare visits
1,001,222

Vaccinations
163,451

DPSC visa screening
1,017,521

Staff (FTEs)

- Doctors: 16%
- Nursing: 37%
- Paramed: 27%
- Administration/support: 20%
Background
Abu Dhabi Blood Bank (ADBB), the major donor center and blood bank in Abu Dhabi, is part of the Transfusion Medicine Services Division of the Department of Laboratory Medicine at Sheikh Khalifa Medical City (SKMC).

It caters to the needs of public and private hospitals across Abu Dhabi and also supports other emirates.

Blood transfusion is almost always essential in heart surgery and organ transplants; the treatment of leukemia, cancer, and other diseases such as sickle cell anemia and thalassemia; and in the care of accident and burn victims.

The unit’s mobile service reaches out to the community by visiting business premises, universities, and public venues to promote the donation of blood.

On average, ADBB collects more than 25,000 units of blood every year and more than 600 units of apheresis platelets. UAE nationals represent about 20% of donors, many of whom have been giving blood regularly for the past 20 years.

ADBB organizes an average of seven blood donation drives weekly with different organizations. Compliance with international standards is ensured in that all donors are carefully screened to meet strict criteria, and all donated blood undergoes six major tests for infectious diseases.

Medical staff also test donors for hemoglobin, blood pressure, and blood type. Collection takes about 10-20 minutes per donor and the entire process from registering to leaving lasts only 45-60 minutes. Volunteers provide nearly all the nation’s blood supply for transfusion: there is no substitute for human blood and eligible blood donors can safely donate three or four times a year.

Just one unit of blood can help in the treatment of three patients: the red cells for one with anemia, the platelets for one with bleeding, and the plasma for different pathologies that need coagulation factors.

Voluntary donors are the foundation of safe blood supply because they are associated with lower levels of infection. Plans are in place to convert to 100% voluntary donations.

Achievements in 2011
- Collected 25,964 units of blood to help save the lives of patients.
- Organized 347 blood donation drives with different corporate organizations in the Emirate of Abu Dhabi, in addition to donors coming to the Blood Bank premises to make a donation.
- Encouraged UAE nationals to participate in blood drives – nationals now represent roughly 20% of all donors and comprise the largest number of donors amongst the many different nationalities that give blood each year.
# Whole blood units donated

## 25,964

### Blood bank donors

<table>
<thead>
<tr>
<th>Year</th>
<th>Donors</th>
<th>National</th>
<th>Expatriate</th>
</tr>
</thead>
<tbody>
<tr>
<td>2011</td>
<td>25,964</td>
<td>4,384</td>
<td>21,580</td>
</tr>
<tr>
<td>2010</td>
<td>25,850</td>
<td>4,240</td>
<td>21,610</td>
</tr>
<tr>
<td>2009</td>
<td>24,758</td>
<td>4,116</td>
<td>20,642</td>
</tr>
<tr>
<td>2008</td>
<td>21,834</td>
<td>3,832</td>
<td>18,002</td>
</tr>
<tr>
<td>2007</td>
<td>19,461</td>
<td>3,311</td>
<td>16,150</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Units donated</th>
<th>20,964</th>
<th>25,850</th>
<th>24,758</th>
<th>22,379</th>
<th>19,849</th>
</tr>
</thead>
<tbody>
<tr>
<td>O +</td>
<td>9,685</td>
<td>9,441</td>
<td>8,960</td>
<td>8,314</td>
<td>7,242</td>
</tr>
<tr>
<td>A +</td>
<td>6,620</td>
<td>6,620</td>
<td>1,430</td>
<td>5,840</td>
<td>5,263</td>
</tr>
<tr>
<td>B +</td>
<td>5,556</td>
<td>5,423</td>
<td>6,421</td>
<td>4,294</td>
<td>4,040</td>
</tr>
<tr>
<td>AB +</td>
<td>1,634</td>
<td>1,727</td>
<td>705</td>
<td>1,302</td>
<td>1,074</td>
</tr>
<tr>
<td>O -</td>
<td>1,280</td>
<td>1,274</td>
<td>5,130</td>
<td>1,346</td>
<td>1,101</td>
</tr>
<tr>
<td>A -</td>
<td>679</td>
<td>711</td>
<td>483</td>
<td>667</td>
<td>587</td>
</tr>
<tr>
<td>B -</td>
<td>560</td>
<td>521</td>
<td>1,493</td>
<td>501</td>
<td>426</td>
</tr>
<tr>
<td>AB -</td>
<td>147</td>
<td>133</td>
<td>136</td>
<td>115</td>
<td>116</td>
</tr>
</tbody>
</table>

Source: Abu Dhabi Blood Bank, Health Statistics Analysis
2011 PERFORMANCE CONTINUED

SEHA Dialysis Services (SDS)

Achievements in 2011

- Fresenius Medical Care has taken over operational responsibility for the newly formed SEHA Dialysis Services (SDS) business entity and set up the key personnel team and administrative service organization.
- A medical advisory board has been formed with heads of all nephrology departments, starting with regular meetings to set medical standards, review performance, and share best practice within SEHA.
- HA-AD granted licenses for all nine dialysis locations in Q3, all being included in a SEHA umbrella contract with Daman. Dialysis codes and new reimbursement arrangements have been agreed and published.
- The first recruitment trip was made in Q3 to tackle the acute shortage of nurses in all SDS clinics. The first 11 new dialysis nurses began work in December, enabling increased dialysis treatment capacity in Q1, 2012.
- The first dialysis patient satisfaction survey (at SKMC dialysis clinics) scored 91.7%, and the second (Al Rahba) achieved 95.7%.
- A new clinic opened in Al Wagan hospital in November and four patients are now being treated there.
- SDS has implemented Oracle and completed budgets and business plans for 2011 and 2012.

Outpatient visit

84,676

Inpatient visit

6,415

Staff (FTEs)

- Nursing: 90%
- Paramed: 7%
- Administration/support: 3%
Clinical Affairs

- A set of clinical quality and patient safety measures has been developed to standardize quality and patient safety measurement. Results are shared with SEHA BEs for internal and international benchmarking.
- BEs have implemented Institute for Healthcare Improvement (IHI) infection control bundles, a structured way of improving processes of care and patient outcomes.
- A cooperation agreement with Abu Dhabi University has been prepared for hospital-based training of graduate and postgraduate students from ADU.
- Under the Research Development Program, Clinical Affairs arranged the SEHA 2nd Annual Research Conference with the theme ‘Horizons for Clinical Research in the United Arab Emirates’.
- The Patient Safety Net Solution contract was finalized with University HealthSystems Consortium and work in progress to assign administration at each facility for proper implementation.
- Under the National Clinical Centers of Excellence Program, preparation for site visits from the Excellence offices such as SKEA, Dubai Quality Award, and Abu Dhabi Excellence Award took place as part of the Excellence Awards and Certifications process.
- Progress with Joint Commission accreditation continues. Lab accreditation is in process at Tawarm, reaccreditation at SKMC, and primary accreditation at Mafraq and WMR.
- Since December, 2011, SEHA facilities have been live on Patient Safety Net (PSN), the real-time, web-based event reporting system. SEHA is also the first in the region to use the Patient Safety Reporting tool that allows benchmarking and sharing of lessons learned across the system.
- A set of clinical quality and patient safety measures and targets were agreed in Q3 2011 to monitor the SEHA Dialysis Service.
- The mandatory SEHA Sentinel Event Policy has been updated and implemented by all SEHA Business Entities (BEs). A SEHA Corporate Sentinel Event Committee is also in place to review and improve BE response to Sentinel Events, serious clinical incidents, and clinical complaints.
- Under the Patient Safety Program, a plan was completed to begin two years of collaboration with the Armstrong Institute for Quality and Safety, focusing on implementing interventions that improve patient safety.
- Clinical Affairs facilitated and coordinated the MoH-led UAE Nursing and Midwifery Council’s research project ‘Nursing and Quality of Hospital Care in the UAE’.
- Clinical Affairs arranged a one-day intensive seminar on good clinical practices (GCP-ICH) in research, with around 100 young researchers participating.
- Clinical Affairs arranged the third SEHA Annual Research Conference in Abu Dhabi, attended by about 700 people.

Operations Division

- Two major achievements were made in managing SEHA’s involvement at public events: zero inventory post-event by using a new material management and supply chain, resulting in an overall savings during the Abu Dhabi F1 Grand Prix alone; and an electronic patient registration system that gives comprehensive data analysis for all patients dealt with during an event.
- The Outsource Pharmacy project applies to 11 pharmacies, and an agreement has been signed with Al Razi Pharmacy to manage five locations.
- Financial reviews and balance sheet audits were conducted at all SEHA business entities.
- The Musharaka Innovation Project has received 110 employee submissions, which are being reviewed and assessed for implementation approval.
- To better determine the cost of providing specialized care to SEHA patients, costing software was implemented and specialist costing expertise recruited.
- The Physician Pay-for-Performance system – based on quality, outcomes, patient satisfaction, and productivity – will be a key driver in the recognition of SEHA’s clinical talent. Full-scale simulation at Al Rahba Hospital will be followed by system-wide application.
- The Da’waay (My Medication) program provides advice to patients during Ramadan regarding their medication, diet, and general health. The campaign highlights four areas: fasting tips for diabetic patients, individuals with heart disease, pregnant women, and children.
- A Medical Response Team comprising 34 doctors (ER, anesthesia, orthopedics, surgery) was assigned and managed in line with top governmental directives for SEHA to support other agencies’ field operations when needed.
- SEHA announced in October that Bumrungrad International would not renew its management services agreement at Mafraq Hospital and would terminate management of the business at the end of 2011. SEHA Corporate helped coordinate a transition plan with management staff at Mafraq to assume direct day-to-day management of the hospital and its related clinics.
- About 2,350 suggestions were submitted under the Musharaka scheme, of which 26 received awards and eight have been implemented.
- The system-wide Chief Nursing Officer Forum completed overall changes in newly graduated nurses training in UAE, handled nursing staff licensing for the Hewitt project as well as finalizing all nurses’ licensing issues.
- On-site audit of SEHA’s emergency preparedness and structured knowledge transfer assures moving from a readiness index of 75.3 overall to 98.3 against basic components (enablers and outcomes).
- A first-of-its-kind training project in emergency management and disaster medicine achieved significant success in three main areas: enrolment – more than 950 trainees from SEHA; involvement of all stakeholders in Abu Dhabi and UAE (governmental, semi-governmental, and NGOs) – more than 250 trainees; and Emiratization – more than half of recruits were UAE nationals.
SEHA Corporate

- The fourth Annual Retreat of SEHA corporate leadership was followed by two strategic alignment conferences that included leaders from Corporate and all business entities. The purpose was to review and update the five-year strategic plan that will provide the foundation for achieving world-class healthcare in Abu Dhabi.

- In accordance with Management Service Agreements, quarterly Joint Service Review meetings reviewed performance criteria and assessed performance of Business Entities to provide ongoing communication and guidance. Quarterly meetings of the Steering Committees were also held to review overall BE activities, assess performance, and provide communication and guidance.

Information Technology and Services Division

- Implementation of Core Clinical Systems has advanced with ‘go-live’ of several Cerner Health Information System applications. These include: Al Faqah (AHS), Mafraq Dental Clinic (AHS), Health Maintenance in AHS Clinics, Registration/Scheduling – Liwa (GMR), Registration/Scheduling – Dalma (GMR), Central PACs Archive (Corniche, Al Rahba), and Pharmacy – dose range checking for 25 high-risk medications.

- Microsoft Great Plains billing system has been completed.

- Revenue Cycle Management (RCM) enhancements include implementation of Self-pay and Government Sponsored Healthcare Services (GSHS) reporting to HA-AD; Diabetes Observation reporting (LOINC) to HA-AD; and AR (accounts receivable) trial balance reporting in the billing system.

- ‘Go live’ events included: PowerChart Maternity, physician documentation via PowerNote (Corniche), IView (advanced care documentation), retail pharmacy and supply chain at all three Al Ain FMCs, Al Ain PACs (Phillips) images to Central Archive, Weqaya 2011 – design and build of extensive screening form, lab order set, data extract from Cerner to Great Plains; Al Ain Phase 2 – documentation and task management; AHS PACs (Phase 1); Ghiathy – registration, radiology, PACs; SKMC – PACs images sent to Central Archive; Tawam – PACs images sent to Central Archive; AHS – premarital screening.

- Transformation of revenue cycle management (RCM) systems enabled a substantial improvement in performance for the year, with the value of claims submitted increasing and the proportion of denied claims declining.

- New projects initiated included: HLA (Transplant) at SKMC; Helix/Cytovision interface (Genomics) at Tawam and SKMC; supply chain (meds) – Corniche and AHS; retail pharmacy at Madinat Zayed and Dhafra Clinic; unified order entry – all BEs; single page document scanning – all BEs; registration, scheduling, radiology and PACs – Al Sila; anatomic pathology syncopetic reporting – all locations.

Human Resources

- As a result of the HR Pay and Policy Project, each SEHA position now has one grade, consistently aligned with the general guidelines used in UAE to organize HR policies and practices. The project took two years of daily work to complete and involved more than 60 full-day workshops with functional managers and HR teams to accomplish the deliverables.

- Nine UAE nationals from SEHA have been enrolled in the Master’s degree in Business Administration (EMBA) program, including physicians and paramedics.

- In collaboration with Tawteen, an Emiratization plan for SEHA has been prepared and a list of vacant positions submitted to Abu Dhabi Tawteen Council to provide national candidates. An agreement to this effect between SEHA and Abu Dhabi Tawteen Council is under development.

- Under the 2011 Scholarship Program, 10 applicants were approved for postgraduate studies internally and externally in Q1.

- The 2011 Summer Training Plan for Emiratization attraction and development was completed, with posters and leaflets distributed to all colleges and universities in Abu Dhabi Emirate to attract competent national candidates.

- Agreement has been reached with Abu Dhabi Tawteen Council for SEHA to train 100 job seekers: diploma (50 candidates), high school (30), and below high school (20).
Early in 2012, SEHA plans to launch ‘Muhakat’ – a program designed to give high school students an understanding of careers in healthcare. Students will spend a day at a hospital – attached to a doctor, nurse, and pharmacist clinical team – getting an insight into the nature of their work.

**Procurement**
- KPMG has been awarded a contract to review and update SEHA procurement policy, and to validate and benchmark procedures and services.
- Customization of the Oracle ‘i-Supplier’ model passed ‘go live’ stage.
- The Oracle inventory management module is being implemented for application within SEHA Corporate Office stationery supplies.
- A comprehensive project is under way to examine and re-engineer supply chain operations to improve the supply of pharmaceuticals, medical supplies, equipment, and services.
- Core Clinical (HIS) began implementation of the downtime application for Al Rahba and completed an upgrade for Al Ain. PowerNote (MD) and Clinical Documentation (RN) were also completed at Al Ain Family Medical Centers. This application will replace physicians’ paper notes. Data Warehouse (PowerInsight) implementation has also been completed.
- Implementing the Oracle i-Supplier program is creating better control and efficiency, while halving overhead costs by doubling productivity and reducing the time taken per transaction. Pharmaceutical RFPs and tenders are now published online.
- Introduction of Pharma KPIs is enabling more accurate assessment of supplier performance and elimination of those not meeting requirements. The system will also assist in enhancing relationships with top-performing suppliers.
- A supply chain cost of ownership study analyzed all aspects such as manpower cost, fixed cost, leased warehouses, and equipment and is proving an excellent tool to determine which supply chain components should be outsourced or handled internally.
- Introduction of three-year vendor contracts for IV Fusion devices contributes to a predictable cost structure and removes vulnerability to un-budgeted price increases.
- Procurement handled a total of 47 RFPs, 37 RFQs, and 29 tenders during 2011, compared to 36, 97, and 27 respectively in 2010.
- Creation of a General Services Manual streamlines procurement process and enforces control, giving end-users visibility of requirements. Similarly, the Oracle inventory management for SEHA stationery enables more accurate consumption history and forecasting.
- Review and update of the Pharma Master List is enabling more accurate consumption history and therefore better future planning to reduce or eliminate shortages or surpluses.

**Corporate Finance**
- Implementation of Diagnosis Related Groups reimbursement included methodology for the Thiqa product as required by HA-AD, and high-level meetings with Daman to discuss DRG pricing for their enhanced products.
- In implementing the four-party (SEHA, HA-AD, DoF and Daman) Note of Understanding (NOU), discussions are taking place with HA-AD/Daman to agree on an approach and plan to finalize activity-based and non activity-based funded mandates, and an application package has been developed for submission to HA-AD for the required approval of additional non activity-based mandates.
- Heads of agreement (HoA) were implemented as part of the Abu Dhabi Healthcare Financing Strategy, with a high-level SEHA task force assigned to drive completion of commitments and a senior-level project manager designated to manage the overall process.
- Redefining the Cerner specialized resources contract/ plan has resulted in splitting into individual contracts/plans to cover charge services and ProFit modules in Cerner) individually.
- The plan to develop SEHA costs to support HoA-identified specialized services (eBurn Unit, Trauma Centers, etc) through Anthem Clinical Costing is being implemented.
- Quarterly 2012 and annual 2012-2016 financial KPI targets were communicated to all SEHA BEs at a workshop with BE CFOs, along with revised/updated SEHA 2012 budgeting/planning assumptions to reflect most recent HoA rates and pricing information.
- Net patient revenue increased compared to 2010 and was ahead of budget for the period.
- Admissions and outpatient visits both increased over the comparable periods, along with favorable growth in inpatient and outpatient revenues.
- SEHA continues to show a favorable growth trend per APD. However, operating cost per APD increased from the previous year due to increases in SWB and supplies expense.
In Q4, Finance signed off the final Central Business Office contract with Dell/Perot as Management Services Agreements partner.

A contract has been signed with ADNIC Insurance as the first non-Daman payer.

Final SEHA budget request for 2012 was submitted to the Abu Dhabi Department of Finance.

Final Cerner charge services and ProFit implementation plans were agreed by all SEHA internal stakeholders.

Facilities and Construction Division

AI Ain Hospital – scope of enabling works completed, existing utilities relocated to clear space for main contractor, project under review by third party in terms of Executive Council request.

Mafraq Hospital – demolition, site entrance, and extension of site offices completed; Mafraq Dialysis Center – structure fully completed, major advancement in electromechanical installations, on schedule to complete the facility by the end of 2011; Mafraq Emergency Room (ER) – renovation and modification completed.

Tawam Dialysis Center – detailed design completed.

SKMC Dialysis Center – detailed design completed, site surveyor appointed, all concrete works in the main service and RMU buildings completed; SKMC Emergency Department – letter of award sent to Al Fara’a and first phase of construction under way; SKMC VIP and Royal Suites interior renovation – consultant re-submitted the new revised scheme, now approved by the SEHA Board.

SEHA new offices – completed works and moved into the new premises.

Madinat Zayed Hospital – completed works in the new Emergency Block.

Corniche NICU expansion – first three phases completed; Corniche OPD and Urgent Care modification – Urgent Care completed and operational, OPD phase 1 handed over.

New England Center for Children – Building 1 roof slab cast, Building 2 basement excavation complete and raft foundation cast.

Al Shahama Clinic – building permit obtained and contractor mobilization started.

Abu Dhabi Medical Rehabilitation Center – completed concept design is not required, concept approval obtained from UPC, architectural schematic design approved by HA-AD, pilot project initiated for web-based document management system.

Al Rahba Hospital Master Development Plan (NICU/ICU/ER) – construction completed.

Ambulatory Healthcare Centers Phase II – concept design completed.

New Mafraq Hospital: Project budget approved by the Executive Council. Construction is ongoing as scheduled.

New Al Ain Hospital: Site maintenance, security, dewatering and pre-engineering office maintenance ongoing within the approved budget of the enabling works; main works tender document completed, tender evaluation in progress. Work due to begin in October, 2012 subject to budget approval.

New SKMC: Concept design completed; UPC approval obtained for master plan.

Ambulatory Clinics Phase I (nine clinics): Construction contracts awarded and proceeding on schedule.

Mafraq Dialysis Center: Construction is 98% completed and awaiting power connection to finish testing and commissioning. The center is expected to be operational by the end of March, 2012.

New England Center for Children: Completed most of the main construction, including five of the six levels.

Madinat Zayed Hospital Expansion: Completed all project phases and handed over to the operator.

Long Term Custodian Care Center for Zayed Higher Organization: Construction began in March, 2011 and is now 90% complete.

New Rehabilitation Center: Completed detailed design, obtained HA-AD approval for architectural schematic design, and approval for detailed design. Tendering is expected at the end of April, 2012.

Special Security Hospital: Completed final design and approval of tender documents. Project is on hold due to prioritization plan.

Disease Prevention Screening Center, Abu Dhabi: Completed detail design, tender documents in preparation. Main works contract award is expected in Q3, 2012 depending on Executive Council approval.

ED SKMC: The first phase began in May, 2011 and is 85% complete. The second phase will begin towards the end of Q2, 2012 with completion scheduled for Q2, 2013.
SEHA has management service agreements (MSAs) in place with Johns Hopkins Medicine International at Al Rahba, Corniche, and Tawam Hospitals, Cleveland Clinic at Sheikh Khalifa Medical City, and VAMED and Medical University of Vienna at Al Ain Hospital.

The performance of hospitals operating under management service agreements is assessed quarterly and facilities that have similar contracts can thus be compared across common areas of measurement. The JSR (Joint Services Review) Committee is responsible for the evaluation of partner-related KPIs tied to performance fees and consists of representatives from the management team of the hospital (employees of the partner) and SEHA’s Corporate Office management team.

JSR meets each partner hospital to set KPIs for the next quarter and review KPIs set in the previous quarter. The percentage of completion of a KPI determines whether the partner has earned a fee for that quarter for that KPI.

These agreements specify 10 key requirements from suppliers:

1. The provision of a high quality of service to patients at the hospital in all aspects, including clinical outcomes, length of stay, and overall patient satisfaction.
2. To improve the morale, efficiency, training, accreditation (where relevant) and post-qualification registration (where relevant) of all personnel engaged at the hospital and ensure that they are provided as high a quality of care as possible.
3. To ensure that realistic budgets are set and achieved; that accurate monthly management accounts are prepared and quarterly accounts are prepared promptly and delivered to the Steering Committee, and/or SEHA; and that proper records are kept of all income and expenditure incurred at the hospital, together with detailed breakdowns of how all costs are incurred to enable transparent accountability for the costs of running the hospital and the ability to demonstrate objectively an improving rate of efficiency and value for money.
4. To comply with the terms of any agreements with Daman and any requirements of Daman, and to effectively manage making claims upon Daman and recovery of payments in respect of services provided to nationals and expatriates covered by Daman.
5. To obtain all necessary licensing, accreditation, certification, and compliance certificates to enable the hospital, its staff, the supplier, and the key personnel to legally carry out their respective activities in Abu Dhabi and to cooperate with all inspections as HA-AD may direct.
6. To raise the reputation of the hospital so that it is valued in the community as a center of good practice and the staff are proud to say they work at the hospital.
7. To provide the required maintenance and improvements so that the hospital is fit for purpose as a quality provider of healthcare services.
8. To undertake to attain teaching hospital status for the hospital and international recognition of such status within five years of the date of signing this agreement.
9. To ensure that the hospital is operated in accordance with all applicable laws and international best health standards and the health regulations.
10. To undertake to attain Joint Commission International Accreditation for the hospital.

### Average Quarterly Performance Scores for 2011

<table>
<thead>
<tr>
<th>Facility</th>
<th>Financial KPIs</th>
<th>Operational KPIs</th>
<th>Business Plan KPIs</th>
<th>Clinical KPIs</th>
<th>HR KPIs</th>
<th>IT KPIs</th>
<th>Payment</th>
<th>Al Gharbia</th>
<th>AHS</th>
</tr>
</thead>
<tbody>
<tr>
<td>SKMC</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Corniche</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mafraq</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Al Rahba</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Al Ain</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tawam</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Financial KPIs
Operational KPIs
Business Plan KPIs
Clinical KPIs
HR KPIs
IT KPIs
Payment
Al Gharbia – To be determined
AHS – To be determined
The very nature of SEHA’s work is inextricably linked to corporate social responsibility. In the same way that police forces, civil defense agencies, and the educational sector are inherently performing a community service, SEHA serves the populace in the same way by providing comprehensive healthcare facilities.

Nevertheless, SEHA is also engaged in specific corporate social responsibility projects that range from environmental care to blood donations.

All new hospitals coming on line are rated under the Estidama methodology for constructing and operating buildings and communities more sustainably. The program is a key aspect of the ‘Plan Abu Dhabi 2030’ drive to build the city according to innovative green standards. ‘Estidama’ is the Arabic word for sustainability.

During 2011, SEHA ran more than 700 blood drives and brought in more than 39,000 units of blood.

**Waste Management**

SEHA generates three kinds of waste and is committed to environmentally safe methods of recycling and disposal for all of them. Normal domestic waste is handled by the municipality and goes to landfills. (Recyclable domestic waste is now being collected separately.)

Medical waste is handled differently depending on where it is collected, either in the greater Abu Dhabi area or in Al Ain. Abu Dhabi medical waste is collected and bagged before transportation to a collection point and placed in isolated and sealed purpose-built containers, separate from any domestic waste.

Containers are taken to a treatment plant where the waste is discharged into a shredder. Everything is finely chopped up and granulated, reducing the volume by 80%. The residue is then sanitized using a disinfecting chemical before being dried and sterilized in an autoclave at 145°C for an hour. Only then can it be safely be removed and taken to a landfill.

Al Ain medical waste is handled differently only at the disposal stage. As in Abu Dhabi, the waste is collected separately and transported in sealed and secure containers to an industrial incinerator where it is burned at 1,000°C. This reduces the volume of the waste by 95%, leaving only sterile ash and sterile inert material that is then trucked to the municipal landfill for disposal.

During 2011, SEHA generated an average of 1.26 kg of waste per patient encounter, defined as total outpatient visits plus total inpatient days. The company’s waste disposal policy and practice – and its educational programs – are contributing to a reduction in the volumes of medical waste and demonstrate the benefits of recycling.
Establishment of SEHA: As part of the initial establishment of Abu Dhabi Health Services Company PJSC (SEHA) in November 2007, a corporate governance framework was established to provide a structure for efficient and reliable corporate decision-making and the control, monitoring, and reporting of business processes in accordance with best practices (within SEHA’s current operating environment), applicable law, and SEHA’s constitutional documents (including the Emiri decree). The corporate governance framework was updated in January 2011 to reflect the development of the organization since its establishment.

Independence from Government of Abu Dhabi

Before its establishment, SEHA was part of the Government of Abu Dhabi through the ownership and operation by the Health Authority-Abu Dhabi (HA-AD) of public healthcare assets. However, pursuant to the Emiri decree, SEHA has been made independent of the Government, except in the latter’s capacity as shareholder. For example, the decree provides that SEHA is “an independent corporate body with full legal capacity to practice its activities and achieve its objectives and with financial and administrative independence in all its affairs”.

Shareholder Governance

By operation of the Emiri decree, the entire share capital of SEHA is owned and held by the Government as the sole legal and beneficial shareholder, acting in shareholder matters through the Executive Council. Under the Companies Act, certain matters are reserved to and voted on by shareholders of a public joint stock company at the annual general meeting. The Executive Council undertakes all functions and practices all competences of such general assembly through issuing Executive Council resolutions.

Board of Directors and Committees

SEHA has a board of directors consisting of government, business, and industry representatives who provide leadership and strategic direction with predominantly private-sector objectives. The Emiri decree gives the board wide powers to carry out the objectives of SEHA (subject to approval of Executive Council or, in certain cases, HA-AD).
The members of the Board are appointed by the Executive Council through issuance of resolutions. The current directors consist of senior management of HA-AD, other Government ministries and Government-owned entities, and a member of SEHA senior management who is also the Chairman of the Board.

The Board of Directors is responsible for the overall management of SEHA by leading and directing SEHA’s affairs and setting its strategic direction and objectives. The decree mandates the basic board structure and responsibilities. It provides that:

- SEHA shall be managed by a Board of Directors which shall consist of a Chairman and a number of members
- The Board is required to be appointed by a resolution of the Chairman of the Executive Council, which shall also establish the terms of Board membership and financial compensation for directors

To ensure transparency regarding independence and potential conflicts of interest in Board decision-making, each Board member is required to review and sign a Statement of Independence and Conflicts of Interest annually or when information contained in the form changes.

The Board of Directors has established certain committees which are responsible for reviewing, informing, and making recommendations to the Board with respect to the committee’s mandate. These committees are the Audit Committee, which is responsible for matters relating to finance and audit, and the Nomination and Remuneration Committee, which is responsible for matters relating to Board nominations and senior management and Board compensation. In addition, SEHA management has implemented Executive, Corporate Procurement, and Corporate Human Resources committees.

Meetings and voting

The procedures of the Board are set out in the Emiri decree and SEHA’s articles of association, which stipulate that the Board must meet at least once every three months. Currently the Board meets quarterly and may (in accordance with the Companies Act) receive and approve resolutions in writing between meetings. Decisions of the Board at meetings must be by majority vote of those present. In the case of an equal number of votes representing each side, the deciding vote shall be made by the Chairman. A meeting of the Board will be valid only if a majority of directors are present. In accordance with the Companies Act, the term of Board membership is three years and a director may serve more than one consecutive term.

Other procedures of the Board of Directors, as prescribed by the Companies Act, are set out in the articles of association, including notifying the Board and abstaining from voting on any transaction or matter submitted to the Board for discussion and approval.

Control of Business Entities

SEHA is organized into a Corporate Office and separate operational Business Entities. Oversight, coordination, and control of the Business Entities are exercised through an appropriate level of organizational governance and operational policies (including delegation of authority limits), functional direct reporting and meetings, and on-going data and performance reviews (including quarterly key performance indicators assessment).
SEHA is leading or initiating several major construction projects that are being implemented in phases and will be completed over the next five to 10 years. This huge infrastructure effort will transform the SEHA HealthSystem, defining its role as the leading healthcare provider and influencing its standing and perception in the Emirate of Abu Dhabi, the UAE, and beyond.

Project budget for the new 745-bed Mafraq Hospital has been approved by the Executive Council, and SEHA has awarded the main construction to Al-Habtoor Leighton Group and Murray & Roberts Contractors. Construction is ongoing as scheduled.

At the new 687-bed Al Ain Hospital, site maintenance, security, dewatering and pre-engineering office maintenance continue in accordance with the supplemental agreement and within the approved budget of the enabling works. The main works tender document was completed in the second half of 2011 and tender evaluation is in progress. Work is due to begin in October, 2012 subject to budget approval.

Concept design to integrate Corniche Hospital with the new SKMC Hospital has been completed and UPC approval obtained for the master plan. Preliminary designs for the Special Security Hospital and for Disease Prevention Screening Centers in Abu Dhabi and Mussafah have also been completed, as has concept design for the new Rehabilitation Hospital.

The 125-bed Special Security Hospital is intended to serve the needs of prisoners and police detainees who need medical care in a secure environment. Completion is scheduled for the first quarter of 2012.

In the first phase of developing new Ambulatory Clinics, construction contracts for Al Hili, Aud Al Toba, Al Yaher, Sweihan, and Al Hayer clinics have been awarded to Alpine-CPC.

Contracts for Mohamed Bin Zayed, Al Zafaranah, Al Bahia, and Shamkha clinics have been awarded to Al Shafar General Contracting and NPC JV. Construction is ongoing at all clinics as scheduled.

Construction of the Mafraq Dialysis Center is 98% completed and awaiting power connection to finish testing and commissioning. The center is the first of its kind in Abu Dhabi and is expected to be operational by the end of March, 2012. The clinic will host 68 individual dialysis units and serve more than 325 patients.

Most of the main construction has been completed at the New England Center for Children, including five of the six levels.

Also planned or under consideration are replacements or enhancements to existing facilities such as Tawam Hospital, Al Sila, and Ghiathy, as well as a number of new Ambulatory Healthcare Centers around the emirate.

The scale of the projects is unprecedented in the regional healthcare industry. These are huge undertakings and a tribute to the commitment of the Emirate of Abu Dhabi to achieve its goal of a high-quality healthcare delivery system second to none.
CONTACT DIRECTORY

Abu Dhabi Health Services Company PJSC (SEHA) Corporate Office
Das Tower, 9th Floor
Sultan bin Zayed (32nd Street) near Khalidiya Children’s Park
PO Box 109090, Abu Dhabi
United Arab Emirates
Tel +971 2 410 2000
Fax +971 2 650 5151/5
contact@seha.ae
www.seha.ae

Key contacts:
HE Saif Bader Al Qubaisi
Chairman and Managing Director
Mr. Carl V. Stanifer
Chief Executive Officer
Mr. Clyde Eder
Chief Operations Officer
Dr. Ali Abdulkarim Al Obaidi
Chief Clinical Officer
Mr. Allen Harris
Chief Financial Officer
Mr. Saif Fadhel Al Hameli
Chief Facilities and Construction
Mr. Robert Pickton
Chief Information Officer
Mr. Mohamed Hamad Al Hameli
Chief Support Services

To contact any officer of Abu Dhabi Health Services Company, please send your correspondence to contact@seha.ae with the name of the officer you wish to communicate with in the subject line.