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Saudi Commission for Health Specialties

Therapeutic Endoscopy



سَبَّحَ لِلَّهِ الْمَجِيدِ



SAUDI FELLOWSHIP THERAPEUTIC ENDOSCOPY

PREPARATION

Curriculum Scientific Group

DR. ABDULRAHMAN ALROBAYAAN
DR. MOHAMMED ALGHAMDI
DR. RAED SULIMAN
DR. AYMAN ALQRAIQRI
DR. FAISAL BATWA

DR. ABDULRAHMAN ALFADDA
DR. ABDULLAH ALGHAMDI
DR. ADEL QUTUB
DR. MAJID ALMADI

CURRICULUM SPECIALISTS

PROF. ZUBAIR AMIN
DR. SAMI ALSHAMMARI

REVIEWED AND APPROVED

Scientific Council

DR. MOHAMMED AI SALEEMI
DR. MAJID AL MADI
DR. FAISAL BATWA
DR. ABDULRAHMAN AL ROBAYAAN

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Correspondence:

Saudi Commission for Health Specialties
P.O. Box: 94656
Postal Code: 11614
Contact Center: 920019393

E-mail: systemadmin@scfhs.org

Website: www.scfhs.org.sa

Formatted and Designed by:

[Manoj Thomas Varghese, CMT \(SCFHS\)](#)

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I. INTRODUCTION

The Kingdom of Saudi Arabia is a rapidly developing country, and there has been remarkable progress in the health services provided to the public. Disorders of the hepatobiliary system constitute a significant cause of morbidity and mortality in the country.

Consequently, there is a demand for a national training program to adequately equip physicians for their work and give them the necessary training for certification by the Saudi Commission for Health Specialties (SCFHS) in pancreatobiliary interventions. The program will provide trainees a good grasp of the basic, clinical elements to healthcare, as well as health's social, economic, and environmental aspects, and enable them to manage gastrointestinal (GI) and pancreatobiliary problems.

The following list highlights the most common clinical problems seen in pancreatobiliary disorders:

- Common bile duct (CBD) stones
- Jaundice
- Acute cholangitis
- Pancreatic cancer
- Cholangiocarcinoma
- Biliary strictures
- Acute pancreatitis
- Chronic pancreatitis

The Therapeutic Endoscopy Fellowship Training Program is a one-year, full-time, structured supervised training program in therapeutic endoscopy. It involves admission to an approved joint program with rotations at different hospitals. We expect each trainee to develop into a subspecialty consultant over one year of training. This requires a transition from the role of trainee to one of greater responsibilities. It is expected that fellows assume the role of a consultant as their knowledge of the subspecialty increases, and qualities including punctuality, reliability, oral and written communication abilities, teaching and supervision of junior trainees, and interaction with allied health workers will be taken into account. Performance in these areas will be monitored and assessed at regular intervals, and trainees will be provided with feedback.

The structure of the Therapeutic Endoscopy Fellowship Training Program is designed to cover both inpatient and outpatient activities. Academic activities are longitudinally distributed across the program to cover all the tools required to equip the trainee to graduate to independent practice. By the end of the fellowship, fellows will be expected to be able to perform the following procedures independently:

- Endoscopic selective cannulation of CBD and pancreatic duct
- Endoscopic sphincterotomy and sphincteroplasty
- Plastic and metallic stent insertion and exchange
- Stone extraction techniques
- Stricture evaluation and treatment techniques

The “Canadian Medical Education Directives for Specialists” (CanMEDS) framework, which is applied to postgraduate training programs in many countries, offers a model of physician competencies that emphasizes not only medical expertise but also additional non-medical expert roles that aim to better serve society's needs. Therefore, the SCFHS has adopted the CanMEDS framework to establish the core curriculum of all training programs, including the Therapeutic Endoscopy Fellowship Training Program.

II. TRAINING PROGRAM OBJECTIVES

General Objectives

Specialists in therapeutic endoscopy are expected to be competent consultants with well-founded knowledge of all aspects of pancreaticobiliary endoscopy, including relevant basic sciences, research, teaching, and appropriate technical capabilities, who are able to establish effective professional relationships with patients and their families and caregivers. They must have sound knowledge of general internal medicine and an appreciation and understanding of the close relationship that commonly exists between diseases of the digestive organs and of other organ systems. They are competent, self-directed learners who can adapt practice patterns according to the general principles of evidence-based medicine.

Fellows must demonstrate the knowledge, skills, and attitudes relating to gender, culture, and ethnicity pertinent to their patients. In addition, all fellows must demonstrate an ability to incorporate gender, cultural, and ethnic perspectives in research methodology, data presentation, and analysis.

Goals

Upon completion of training, a fellow is expected to be a competent subspecialist in endoscopy of pancreaticobiliary diseases, capable of assuming a consultant's role. Fellows must demonstrate the requisite knowledge, skills, and attitudes for effective patient-centered care and service to a diverse population.

Competencies

At the completion of training, the fellow will have acquired the following competencies and will function effectively as a:

1. Medical expert
2. Communicator
3. Collaborator
4. Manager
5. Health advocate
6. Scholar
7. Professional

Medical Expert

Definition

As medical experts, therapeutic endoscopy fellows integrate all of the CanMEDS roles, applying medical knowledge, clinical skills, and professional attitudes in their patient-centered care. A medical expert constitutes the central physician role in the CanMEDS framework.

Description

Therapeutic endoscopy fellows possess a defined body of knowledge, clinical skills, procedural skills, and a professional attitude, which are utilized to provide effective patient-centered care. They apply these competencies to collect and interpret information, make appropriate clinical decisions, and carry out diagnostic and therapeutic interventions. They do so within the boundaries of their discipline, personal expertise, the healthcare setting, and the patient's preferences and context. Their care is characterized by up-to-date, ethical, and resource-efficient clinical practice as well as effective communication with patients, other healthcare providers, and the community.

The role of medical expert is central to physician functioning and draws on the competencies from the roles of communicator, collaborator, manager, health advocate, scholar, and professional.

Key competencies: Therapeutic endoscopy fellows are able to

- Function effectively as consultants, integrating all CanMEDS roles to provide optimal, ethical, and patient-centered medical care;
- Establish and maintain clinical knowledge, skills, and attitudes appropriate to their practice;
- Perform a complete and appropriate assessment of a patient;
- Use preventive and therapeutic interventions effectively;
- Demonstrate proficient and appropriate use of procedural skills, both diagnostic and therapeutic; and
- Seek appropriate consultation from other health professionals, recognizing the limits of their expertise.

Enabling competencies: Therapeutic endoscopy fellows are able to do the following:

- 1) Function effectively as consultants, integrating all CanMEDS roles to provide optimal, ethical, and patient-centered medical care:
 - Effectively perform a consultation, including the presentation of well-documented assessments and recommendations in written and/or verbal form in response to a request from another healthcare professional.
 - Demonstrate effective use of all CanMEDS competencies relevant to their practice.
 - Identify and appropriately respond to relevant ethical issues arising in patient care.
 - Effectively and appropriately prioritize professional duties when faced with multiple patients and problems.
 - Demonstrate compassionate, patient-centered care.
 - Recognize and respond to ethical dimensions in medical decision-making.
 - Demonstrate medical expertise in situations other than patient care, such as providing expert legal testimony or advising governments, as needed.
- 2) Perform a complete and appropriate assessment of a patient:
 - Elicit a history that is relevant, concise, and accurate regarding context and preferences for the purposes of prevention and health promotion, diagnosis, and/or management.
 - Perform a focused physical examination that is relevant and accurate for the purposes of prevention and health promotion, diagnosis, and/or management, with particular emphasis on areas specific to the digestive system and its disorders.
 - Select and interpret medically appropriate investigative methods in a resource-effective and ethical manner, including:
 - Imaging modalities (barium studies, ultrasound, computerized tomography (CT) scan, magnetic resonance imaging (MRI), radioisotope scan, endoscopic retrograde cholangiopancreatography (ERCP), and endoscopic ultrasound for the pancreas, liver and biliary system.
 - Appropriate use and care of equipment used in ERCP procedures.
 - Appropriate use of clinical data to formulate problems and correctly develop investigation and management plans to deal with patient problem(s).
 - Demonstrate effective clinical problem-solving and judgment to address patient problems, including interpreting available data and integrating information to generate differential diagnoses and management plans for pancreaticobiliary diseases.
 - Demonstrate the ability to recognize, evaluate, and manage pancreaticobiliary emergencies, including, but not limited to:

TRAINING PROGRAM OBJECTIVES

- Acute pancreatitis.
- Biliary and/or pancreatic leaks.
- Biliary obstruction, including ascending cholangitis.

3) Use preventive and therapeutic interventions effectively:

- Implement an effective management plan in collaboration with patients and their families.
- Demonstrate effective, appropriate, and timely application of preventive and therapeutic interventions relevant to the physician's practice.
- Ensure appropriate informed consent is obtained for therapies.
- Ensure patients receive appropriate end-of-life care.
- Demonstrate effective, appropriate, and timely application of preventive and therapeutic interventions relevant to the pancreaticobiliary system, including but not limited to:
 - CBD stones
 - CBD strictures
 - Pancreatic cancer
 - Ampullary cancer
 - Pancreatic cysts

4) Demonstrate proficient and appropriate use of procedural skills, both diagnostic and therapeutic:

- Demonstrate effective, appropriate, and timely performance of diagnostic and therapeutic procedures relevant to their practice.
- Ensure appropriate informed consent is obtained for procedures.
- Appropriately document and disseminate information related to performed procedures and their outcomes.
- Ensure adequate follow-up is arranged for performed procedures.

5) Seek appropriate consultation from other health professionals, recognizing the limits of their expertise:

- Demonstrate insight into their own limitations of expertise via self-assessment.
- Demonstrate effective, appropriate, and timely consultation with other health professionals as needed for optimal patient care.
- Arrange appropriate follow-up care services for patients and their families.

6) Establish and maintain clinical knowledge, skills, and attitudes appropriate to the pancreaticobiliary system:

- Apply knowledge of the clinical, socio-behavioral, and fundamental biomedical sciences relevant to the pancreaticobiliary system, including:
 - Embryology, anatomy, physiology, and pathology of the pancreas, liver, and biliary system.
 - Principles of biochemistry, molecular biology, and genetics as they apply to the pancreaticobiliary system.
 - Principles of metabolism, pharmacokinetics, pharmacodynamics, and toxicity of drugs commonly used in the pancreaticobiliary system.
 - Principles of endocrinology, intermediary metabolism and nutrition, oncology, microbiology, and psychiatry as they apply to the pancreaticobiliary system.
 - Principles of pancreaticobiliary surgery, including indications for and complications of operations on the pancreaticobiliary system.

- Diseases affecting the pancreaticobiliary system, pancreas, and liver, including the epidemiology, pathophysiology, methods of diagnosis, management, and prognosis of such diseases.
- Indications, interpretations, limitations, and complications of diagnostic procedures performed on the pancreaticobiliary system.
- Hazards of endoscopic procedures for the operator, assistants, and patients and the measures appropriate to minimize such hazards.
- Principles of fluoroscopy used during endoscopic procedures, including the safe use of X-rays for both patients and operator.
- Advances in the management of pancreaticobiliary disorders, transplantation, and therapeutic endoscopy.
- Describe the CanMEDS framework of competencies relevant to the pancreaticobiliary system.

Communicator

Definition

As communicators, therapeutic endoscopy fellows effectively facilitate the doctor-patient relationship and the dynamic exchanges that occur before, during, and after the medical encounter.

Description

Therapeutic endoscopy fellows enable patient-centered communication through shared decision-making and effective dynamic interactions with patients, families, caregivers, other professionals, and other key individuals. The competencies of this role are essential for establishing rapport and trust, formulating a diagnosis, delivering information, striving for mutual understanding, and facilitating a shared plan of care. Poor communication can lead to undesired outcomes, and effective communication is critical for optimal patient outcomes. The application of these communication competencies and the nature of the doctor-patient relationship vary for different specialties and forms of medical practice.

Key competencies

Therapeutic endoscopy fellows are able to

1. Develop rapport, trust, and ethical relationships with patients and families;
2. Accurately elicit and synthesize relevant information and perspectives of patients and families, colleagues, and other professionals;
3. Accurately convey relevant information and explanations to patients and families, colleagues, and other professionals;
4. Develop a common understanding on issues, problems, and plans with patients and families, colleagues, and other professionals to develop a shared plan of care; and
5. Convey effective oral and written information about a medical encounter.

Enabling competencies

Therapeutic endoscopy fellows are able to do the following:

- 1) Develop rapport, trust, and ethical relationships with patients and families:
 - Recognize that being a good communicator is a core clinical skill for therapeutic endoscopy fellows and that effective physician-patient communication can foster patient satisfaction, physician satisfaction, adherence, and improved clinical outcomes.
 - Establish positive relationships with patients and their families that are characterized by understanding, trust, respect, honesty, and empathy.
 - Respect patient confidentiality, privacy, and autonomy.
 - Listen effectively.

TRAINING PROGRAM OBJECTIVES

- Be aware and responsive to nonverbal cues.
 - Effectively facilitate a structured clinical encounter.
 - Communicate effectively in order to obtain a thorough and relevant patient history.
 - Demonstrate sensitivity to patient concerns when presenting in the presence of a patient and/or family.
- 2) Accurately elicit and synthesize relevant information and perspectives of patients and families, colleagues, and other professionals:
- Gather information about a disease but also about a patient's beliefs, concerns, expectations, and illness experience.
 - Seek out and synthesize relevant information from other sources, such as a patient's family, caregivers, and other professionals.
- 3) Accurately convey relevant information and explanations to patients and families, colleagues, and other professionals:
- Deliver information to a patient and family, colleagues, and other professionals in a human, authentic manner and in such a way that it is understandable and encourages discussion and participation in decision-making.
- 4) Develop a common understanding on issues, problems, and plans with patients, families, and other professionals to develop a shared plan of care:
- Effectively identify and explore problems to be addressed from a patient encounter, including the patient's context, responses, concerns, and preferences.
 - Respect diversity and difference, including but not limited to the impact of gender, religion, and cultural beliefs on decision-making.
 - Encourage discussion, questions, and interaction in the encounter.
 - Engage patients, families, and relevant health professionals in shared decision-making to develop a plan of care.
 - Effectively address challenging communication issues such as obtaining informed consent, delivering bad news, and addressing anger, confusion, and misunderstanding.
- 5) Convey effective oral and written information about a medical encounter:
- Maintain clear, accurate, and appropriate records (e.g., written or electronic) of clinical encounters and plans.
 - Effectively present verbal reports of clinical encounters and plans.
 - When appropriate, effectively present medical information to the public or media about a medical issue.
 - Demonstrate effective consultation skills in presenting well-documented assessments and recommendations in written and/or verbal form, including:
 - Procedural and specialty test reports.
 - Responses to requests by other health professionals and third parties.

Collaborator

Definition

As collaborators, therapeutic endoscopy fellows effectively work within a healthcare team to achieve optimal patient care.

Description

Therapeutic endoscopy fellows work in partnership with others who are appropriately involved in the care of individuals or specific groups of patients. This collaboration is increasingly important in a modern, multiprofessional environment where the goal of patient-centered care is widely shared. Modern healthcare teams not only include a group of professionals working closely together at one site, such as a ward team, but also extended teams with a variety of perspectives and skills in multiple locations. It is therefore essential for physicians to be able to collaborate effectively with patients, families, and an interprofessional team of expert health professionals for the provision of optimal care, education, and scholarship.

Key competencies

Therapeutic endoscopy fellows are able to:

1. Participate effectively and appropriately as part of an interprofessional healthcare team; and
2. Effectively work with other health professionals to prevent, negotiate, and resolve interprofessional conflict.

Enabling competencies

Therapeutic endoscopy fellows are able to do the following:

- 1) Participate effectively and appropriately in an interprofessional healthcare team:
 - Clearly describe their roles and responsibilities to other professionals.
 - Describe the roles and responsibilities of other professionals within the healthcare team.
 - Recognize and respect the diversity of roles, responsibilities, and competencies of other professionals in relation to their own.
 - Work with others to assess, plan, provide, and integrate care for individual patients or groups of patients.
 - Where appropriate, work with others to assess, plan, provide, and review other tasks, such as research problems, educational work, program review, or administrative responsibilities.
 - Participate effectively in interprofessional team meetings.
 - Enter into interdependent relationships with other professions for the provision of quality care.
 - Describe the principles of team dynamics.
 - Respect team ethics, including confidentiality, resource allocation, and professionalism.
 - Demonstrate leadership in their healthcare team, as appropriate.
- 2) Effectively work with other health professionals to prevent, negotiate, and resolve interprofessional conflict:
 - Demonstrate a respectful attitude toward other colleagues and members of an interprofessional team.
 - Work with other professionals to prevent conflicts.
 - Employ collaborative negotiation to resolve conflicts.
 - Respect differences, misunderstandings, and limitations in other professionals.
 - Recognize one's own differences, misunderstandings, and limitations that may contribute to interprofessional tension.
 - Reflect on interprofessional team function.

Healthcare Leader

Definition

As leaders, therapeutic endoscopy fellows are integral participants in healthcare organizations, organizing sustainable practices, making decisions about allocating resources, and contributing to the effectiveness of the healthcare system.

Description

Therapeutic endoscopy fellows interact with their work environment as individuals, members of teams or groups, and participants in the local, regional and national health systems. Physicians function as leaders in their everyday practice activities involving co-workers, resources and organizational tasks, such as care processes, and policies, as well as in the balance between professional and personal lives. Thus, physicians require the ability to prioritize, effectively execute tasks collaboratively with colleagues, and make systematic choices when allocating scarce healthcare resources. The CanMEDS leader role describes the active engagement of all physicians as integral participants in decision-making in the operation of the healthcare system. They act to lead change in healthcare management in collaboration with other stakeholders to achieve cost-effective, best-quality care.

Key competencies

Therapeutic endoscopy fellows are able to:

- 1) Participate in activities that contribute to the effectiveness of their healthcare organizations and systems;
- 2) Manage their practice and career effectively;
- 3) Allocate healthcare resources appropriately; and
- 4) Serve in administration and leadership roles, as appropriate.

Enabling competencies

Therapeutic endoscopy fellows are able to do the following:

- 1) Participate in activities that contribute to the effectiveness of their healthcare organizations and systems.
 - Work collaboratively with others in their organizations.
 - Participate in systemic quality process evaluation and improvement, such as patient safety initiatives.
 - Describe healthcare system structure and function as it relates to pancreaticobiliary services, including physician roles.
 - Describe principles of healthcare financing, including budgeting and organizational funding.
- 2) Manage their practice and career effectively
 - Set priorities and manage time to balance patient care, practice requirements, outside activities, and personal life.
 - Manage practice-related activities, including finances and human resources.
 - Implement processes to ensure personal practice improvement.
 - Employ information technology appropriately for patient care.
- 3) Allocate healthcare resources appropriately:
 - Recognize the importance of the fair allocation of healthcare resources, balancing effectiveness, efficiency, and access with optimal patient care.
 - Apply evidence and management processes for cost-appropriate care.

- 4) Serve in administration and leadership roles, as appropriate:
- Chair or participate effectively in committees and meetings.
 - Lead or implement a change in healthcare.
 - Plan relevant elements of healthcare delivery (e.g., work schedules).

Health Advocate

Definition

As health advocates, therapeutic endoscopy fellows responsibly use their expertise and influence to advance the health and well-being of individual patients, communities, and populations.

Description

Therapeutic endoscopy fellows recognize their duty and ability to improve the overall health of their patients and the society they serve. Doctors identify advocacy activities as important for the individual patient, for patient populations, and for communities. Individual patients need physicians to assist them in navigating the healthcare system and accessing the appropriate health resources in a timely manner. Communities and societies need physicians' special expertise to identify and collaboratively address broad health issues and the determinants of health. At this level, health advocacy involves efforts to change specific practices or policies on behalf of those served. Framed in this multilevel way, health advocacy is an essential and fundamental component of health promotion. Health advocacy is appropriately expressed by both individual and collective actions of physicians in influencing public health and policy.

Key competencies

Therapeutic endoscopy fellows are able to

1. Respond to individual patient health needs and issues as part of patient care;
2. Respond to the health needs of the communities they serve;
3. Identify the determinants of health of the populations they serve; and
4. Promote the health of individual patients, communities, and populations.

Enabling competencies

Therapeutic endoscopy fellows are able to do the following:

- 1) Respond to individual patient health needs and issues as part of patient care:
 - Identify the health needs of an individual patient.
 - Identify opportunities for advocacy, health promotion, and disease prevention with individuals to whom they provide care.
- 2) Respond to the health needs of the communities they serve:
 - Describe the practice communities that they serve.
 - Identify opportunities for advocacy, health promotion, and disease prevention in the communities they serve and respond appropriately.
 - Describe, in broad terms, the key issues currently under debate regarding changes in the Saudi healthcare system, indicating how these changes might affect societal health outcomes, and how therapeutic endoscopists can advocate decreasing the burden of illness from conditions or problems relevant to therapeutic endoscopy at a community or societal level.
 - Appreciate the possibility of competing interests between the communities served and other populations.

- 3) Identify the determinants of health for the populations they serve:
 - Identify the determinants of health for populations, including barriers to access to care and resources, and apply this understanding to common problems and conditions in pancreaticobiliary disease.
 - Identify vulnerable or marginalized populations within those served, applying the available knowledge about prevention to at-risk groups within the practice.
- 4) Promote the health of individual patients, communities, and populations:
 - Describe an approach to implementing a change in a determinant of health of the populations served.
 - Describe how public policy impacts the health of the populations served.
 - Identify current policies that affect pancreaticobiliary health, either positively or negatively, including but not limited to immunization for viral hepatitis, anti-tobacco legislation, alcohol and substance abuse programs, and healthcare for high-risk populations.
 - Identify points of influence in the healthcare system and its structure.
 - Describe the ethical and professional issues inherent in health advocacy, including altruism, social justice, autonomy, integrity, and idealism.
 - Appreciate the possibility of conflict inherent in their role as health advocates for a patient or community with that of a manager or gatekeeper.
 - Describe the role of the medical profession in advocating collectively for health and patient safety.

Scholar

Definition

As scholars, therapeutic endoscopy fellows demonstrate a lifelong commitment to reflective learning, as well as the creation, dissemination, application, and translation of medical knowledge.

Description

Physicians engage in a lifelong pursuit of mastering their domain of expertise. As learners, they recognize the need to be continually learning and to model this for others. Through their scholarly activities, they contribute to the creation, dissemination, application, and translation of medical knowledge. As teachers, they facilitate the education of their students, patients, colleagues, and others.

Key competencies

Therapeutic endoscopy fellows are able to

1. Maintain and enhance professional activities through ongoing learning;
2. Critically evaluate information and its sources and apply this appropriately to practice decisions;
3. Facilitate the learning of patients, families, students, residents, other health professionals, the public, and others, as appropriate; and
4. Contribute to the creation, dissemination, application, and translation of new medical knowledge and practices.

Enabling competencies

Therapeutic endoscopy fellows are able to do the following:

- 1) Maintain and enhance professional activities through ongoing learning:
 - Describe the principles of maintenance of competence.
 - Describe the principles and strategies for implementing a personal knowledge management system.

TRAINING PROGRAM OBJECTIVES

- Recognize and reflect learning issues in practice.
 - Conduct a personal practice audit.
 - Pose an appropriate learning question.
 - Access and interpret relevant evidence.
 - Integrate new learning into practice.
 - Evaluate the impact of any change in practice.
 - Document the learning process.
 - Demonstrate knowledge of new advances in the management of gastrointestinal disorders, including but not limited to new endoscopic procedures and techniques.
- 2) Critically evaluate medical information and its sources and apply this appropriately to practice decisions:
- Describe the principles of critical appraisal.
 - Critically appraise retrieved evidence in order to address a clinical question.
 - Integrate critical appraisal conclusions into clinical care.
 - Describe and critically appraise recent landmark articles that impact current therapeutic endoscopy practice.
- 3) Facilitate the learning of patients, families, students, residents, other health professionals, the public, and others, as appropriate:
- Describe principles of learning relevant to medical education.
 - Collaboratively identify others' learning needs and desired learning outcomes.
 - Select effective teaching strategies and content to facilitate others' learning.
 - Give an effective lecture or presentation.
 - Assess and reflect on a teaching encounter.
 - Provide effective feedback.
 - Describe the principles of ethics with respect to teaching.
- 4) Contribute to the development, dissemination, and translation of new knowledge and practices:
- Describe the principles of research and scholarly inquiry.
 - Describe the principles of research ethics.
 - Pose a scholarly question.
 - Conduct a systematic search for evidence.
 - Select and apply appropriate methods to address the question.
 - Appropriately disseminate the findings of a study.

Professional

Definition

As professionals, therapeutic endoscopy fellows are committed to the health and well-being of individuals and society through ethical practice, profession-led regulation, and high personal standards of behavior.

Key competencies

Therapeutic endoscopy fellows are able to

1. Demonstrate a commitment to their patients, profession, and society through ethical practice;
2. Demonstrate a commitment to their patients, profession, and society through participation in profession-led regulation;
3. Demonstrate a commitment to physician health and sustainable practice;

4. Demonstrate a commitment to uphold the highest standards of ethical and professional behavior in regard to research and industry.

Enabling competencies

Therapeutic endoscopy fellows are able to do the following:

- 1) Demonstrate a commitment to their patients, profession, and society through ethical practice:
 - Respect patient autonomy, confidentiality, and the need for consent in all dealings with the patient.
 - Prioritize the rights, needs, and interests of the patient while respecting professional obligations to society in matters related to healthcare planning and resource allocation.
 - Exhibit appropriate professional behaviors in practice, including honesty, integrity, disclosure, commitment, compassion, respect, and altruism.
 - Demonstrate a commitment to delivering the highest quality care and maintenance of competence.
 - Demonstrate respect for others, including refraining from harassment or discrimination based on race, religion, ethnicity, gender, physical handicap, illness, age, or other factors.
 - Provide for continuity of care once professional responsibility has been accepted until such care is no longer required or alternative arrangements have been made.
 - Maintain appropriate relations with patients and avoid all forms of sexual exploitation of patients, including abuse, harassment, or impropriety, and taking physical, emotional, or financial advantage of patients.
 - Display the principles of beneficence, non-maleficence, patient autonomy, and honesty in dealings with patients.
 - Abstain from use of illicit drugs and inappropriate use of medication, mood-altering drugs, or alcohol.
- 2) Demonstrate a commitment to their patients, profession, and society through participation in profession-led regulation:
 - Demonstrate knowledge and an understanding of the professional, legal, and ethical codes of practice, including physician-industry interaction.
 - Fulfill the regulatory and legal obligations required of their current practice.
 - Demonstrate accountability to professional regulatory bodies.
 - Recognize and appropriately respond to others' unprofessional behaviors in their practice.
 - Participate in peer review.
 - Recognize the principles and limits of patient confidentiality as defined by professional practice standards and the law.
 - Recognize and appropriately respond to ethical issues encountered in their practice.
 - Avoid taking advantage of real or perceived inequality in dealings with students, fellows, and employees.
 - Manage conflicts of interest.
- 3) Demonstrate a commitment to physician health and sustainable practice:
 - Balance personal and professional priorities to ensure personal health and a sustainable practice.
 - Strive to heighten personal and professional awareness and insight.
 - Recognize other professionals in need and respond appropriately.
 - Recognize the limitation of one's own competence and continually strive to improve one's knowledge, skills, and competence as a physician and seek help from others when needed.

TRAINING PROGRAM OBJECTIVES

- 4) Demonstrate a commitment to uphold the highest standards of ethical and professional behavior in regard to research:
- Apply integrity and honesty in the collection, interpretation, and reporting of data.
 - Develop research in a scientifically and ethically valid way and ensure it has received appropriate consent and approval.
 - Apply standards and rules of any sponsoring agencies and journals in which research study results are published.
 - Avoid scientific misconduct, misrepresentation, or falsification of data in all research.
 - Adhere to the highest standards of integrity, avoid real or perceived conflicts of interest in clinical trials and evaluations of drugs, medical devices, or other diagnostic and therapeutic modalities, and avoid taking undue financial or other advantage from information gained from or by reporting on such studies.
- 5) Demonstrate a commitment to uphold the highest standards of ethical and professional behavior in regard to industry:
- Critique any real or potential conflict of interest or commitment to industry and propose to resolve any possible conflicts while ensuring the physician's primary objective remains patient welfare.
 - Participate in continuing medical education (CME) activities, surveillance studies, and the like and adhere to the CME guidelines governing physicians and the pharmaceutical industry.

III. RULES AND REGULATIONS

Criteria for applicant/fellow selection

Applicants must meet the following criteria:

1. Fulfill all the requirements as per SCFHS admission requirements for postgraduate training programs (scfhs.org.sa).
2. Possess board certification in internal medicine from a program accredited by the SCFHS.
3. Possess a Saudi Specialty Certificate in gastroenterology or its equivalent (approved by the SCFHS).
4. Be licensed to practice medicine in Saudi Arabia.
5. Provide written permission from the sponsoring institution allowing participation in full-time training for the entire one-year program.
6. Sign an agreement to follow the rules and regulations of the training program and the SCFHS.
7. Successfully pass the interview.
8. Provide three letters of recommendation from consultants with whom they have recently worked.
9. Register as a trainee at the SCFHS.
10. Pass the entry interview at SCFHS with the Fellowship Training Committee, who will evaluate candidates on the following criteria:
 - Medical background
 - Educational background
 - Honors and awards
 - Letters of recommendation
 - Research experience
 - Professionalism
 - Previous expertise

Faculty qualification and center accreditation requirements

1. Therapeutic endoscopy training should occur in units that provide a complete and comprehensive range of services for patients with pancreaticobiliary disorders.
2. These services include outpatient clinics, endoscopic and radiological procedures, and active involvement in multidisciplinary team (MDT) meetings with physicians who work closely with hepaticopancreaticobiliary (HPB) surgical units, subspecialty oncologists, and histopathologists.
3. The accredited training center should provide ERCP services classified as advanced (difficulty grades of 2 or 3 according to the guidelines from the American Society for Gastrointestinal Endoscopy [ASGE]), a minimum number of procedures performed, and the presence of qualified subspecialty consultants who have teaching experiences and are committed to training candidates in both academic and practical skills.

IV. TEACHING AND LEARNING

Because fellows have already completed training in internal medicine and gastroenterology, the teaching and learning will be structured and programmatic with more opportunity for self-directed learning.

Trainees are expected to receive at least four hours of formal training per week delivered in conjunction with the trainer at the assigned training site. These training sessions would cover general as well as specialty-specific topics and topics chosen by the trainee.

Rotations

1. City-based rotations would occur four times during the program, each lasting one month.
2. All fellows should rotate through all approved institutions within the same city.
3. Fellows should spend one month per elective.
4. Fellows should be offered one month for dedicated research activity during training.
5. During the year, fellows are expected to learn/master the principles of therapeutic endoscopy, which include:
 - Indications, limitations, and interpretation of findings.
 - Sedation in endoscopy: principles, drugs, side effects, monitoring, documentation, discharge, reversal, and referral for anesthesia.
 - Informed consent.
 - Documentation.
 - Medications used during endoscopy and their potential complications.
 - Observation and training to perform endoscopic procedures.
 - How to clean, disinfect, and take care of endoscopic equipment.
 - By the end of the training year, fellows should be competent in performing ERCP and should be able to perform a minimum of 150 ERCPs, including sphincterotomies, basket and balloon extraction of CBD stones, and plastic/metal stent insertion.

Scope of Activities

A. Patient care activities

If a consultant opinion is sought or an ERCP procedure is required, the patient will be seen by the trainee, who will review the history, perform the physical examination, review investigations, and present the case to the physician in charge. Case-based discussion incorporating clinical reasoning and critical thinking techniques should lead to formal shared decision-making to solve the patient's clinical problem.

B. Non-patient care activities

In addition to patient care, fellows should have extensive exposure to other academic activities, including:

1. Independent learning: reading current textbooks and relevant scientific literature.
2. Gastroenterology journal club: once a month.
3. Gastroenterology/hepatology meetings.
4. Regional gastroenterology meetings.
5. One national meeting per year.
6. One international meeting during the training period (optional).
7. Presentation of pancreaticobiliary clinical cases or topics.
8. Departmental educational activities:
 - Fellows are expected to attend morning reports, bedside rounds, grand rounds, and pathology and radiology rounds.

9. Research activity:
 - During the training period, fellows should be encouraged to complete at least one retrospective chart review or submit one case report that would be presented in the annual national meeting.
10. Teaching experiences:
 - The fellow must participate actively in the teaching of medical students, medical residents, and junior GI fellows whenever possible.
11. Pancreaticobiliary meetings:
 - Monthly meetings/radiology meetings/journal clubs.
 - Annual meetings (international or local) seven total days per year.

C. General topics

These are determined by the SCFHS as outlined in the General Adult Gastroenterology Training Program as well as the Internal Medicine Training Program. These will include modules with a self-assessment portion after the topics have been reviewed.

D. Core specialty topics:

These will include topics outlined in the table below; all should be based on the best available current knowledge and clinical practice guidelines.

Case discussions and interactive lectures

Topics
Approach to common bile duct stones
Approach to cholangitis
Approach to complicated gallstone disease
Approach to acute pancreatitis
Approach to complications of pancreatitis
Approach to chronic pancreatitis
Approach to primary sclerosing cholangitis
Approach to proximal biliary strictures
Approach to distal biliary strictures
Approach to pancreatic cancer
Approach to pancreatic cysts
Approach to choledochal cysts
Approach to gallbladder polyps
Approach to gallbladder stones
Approach to gallbladder neoplasms
Approach to sphincter of Oddi dysfunction
Approach to post-surgical bile leaks
Decreasing the risk of ERCPs
ERCPS in children
ERCP recording, reporting, and communication

Workshops and simulation courses

Topic	Comments
Sedation for prolonged procedures	The candidate should be certified in basic life support (BLS) and advanced cardiac life support (ACLS), as well as attend a course for conscious sedation or have active and valid certification in BCLS, ACLS, and conscious sedation.
Biliary cannulation	When feasible, fellows are encouraged to utilize ERCP procedures using a simulator.
Difficult biliary cannulation	When feasible, fellows are encouraged to utilize the electronic simulators that are available in some of the training centers.

Teaching Resources

Suggested textbooks, journals, and professional societies

Suggested Textbooks		
<i>Cotton and Williams' Practical Gastrointestinal Endoscopy: The Fundamentals</i>	Edited by Adam Haycock, Jonathan Cohen, Brian P. Saunders, Peter B. Cotton, and Christopher B. Williams	ISBN: 9781118406465
<i>ERCP</i>	Edited by David Leslie Carr-Locke, Richard A. Kozarek, Todd H Baron	ISBN-13: 978-0323481090
<i>Sleisenger and Fordtran's Gastrointestinal and Liver Disease: Pathophysiology, Diagnosis, Management (10th Edition)</i>	Edited by Mark Feldman, Lawrence S. Friedman, and Lawrence J. Brandt	ISBN 978-1-4557-4692-7
<i>Yamada's Textbook of Gastroenterology, 2 Volume Set (6th Edition)</i>	Edited by Daniel K. Podolsky, Michael Camilleri, J. Gregory Fitz, Anthony N. Kalloo, Fergus Shanahan, and Timothy C. Wang	ISBN-10: 1118512065
<i>Yamada's Atlas of Gastroenterology (5th Edition)</i>	Edited by Daniel K. Podolsky, Michael Camilleri, J. Gregory Fitz, Anthony N. Kalloo, Fergus Shanahan, and Timothy C. Wang	ISBN-10: 1118496434

Professional Societies	
Saudi Gastroenterology Association (SGA)	https://www.saudigastro.com
American College of Gastroenterology	http://www.acg.gi.org/
American Gastroenterological Association (AGA)	http://www.gastro.org/
American Society for Gastrointestinal Endoscopy (ASGE)	http://www.asge.org/
Canadian Association of Gastroenterology	http://www.cag-acg.org/
World Gastroenterology Organisation (WGO)	http://www.worldgastroenterology.org/

TRAINING PROGRAM OBJECTIVES

Suggested Gastroenterology Journals	
Top Journals	
<i>Gastroenterology</i>	http://www.gastrojournal.org
<i>The American Journal of Gastroenterology</i>	http://www.nature.com/ajg/index.html
<i>Gut</i>	http://gut.bmj.com
<i>Gastroenterology Clinics</i>	http://www.gastro.theclinics.com
<i>Alimentary Pharmacology & Therapeutics</i>	http://onlinelibrary.wiley.com/journal/10.1111/(ISSN)1365-2036/issues
<i>Clinical Gastroenterology and Hepatology</i>	http://www.cghjournal.org
<i>The Saudi Journal of Gastroenterology</i>	http://www.saudiigastro.com
Other Journals	
<i>Current Opinion in Gastroenterology</i>	http://journals.lww.com/co-gastroenterology/pages/default.aspx
<i>Canadian Journal of Gastroenterology and Hepatology</i>	https://www.hindawi.com/journals/cjgh/
<i>Digestion</i>	https://content.karger.com/Journal/Home/223838
<i>Digestive Diseases</i>	https://content.karger.com/Journal/Home/224231
<i>Journal of Gastrointestinal and Liver Diseases</i>	http://www.igld.ro/wp/
<i>Journal of Clinical Gastroenterology</i>	http://journals.lww.com/jcge/pages/default.aspx
<i>Journal of Gastroenterology and Hepatology</i>	http://onlinelibrary.wiley.com/journal/10.1111/(ISSN)1440-1746/issues
<i>Pancreas</i>	http://journals.lww.com/pancreasjournal/pages/default.aspx
<i>Pancreatology</i>	https://content.karger.com/Journal/Home/224334
<i>Scandinavian Journal of Gastroenterology</i>	http://www.tandfonline.com/toc/igas20/current
General Medical Journals	
<i>Annals of Internal Medicine</i>	http://annals.org/aim
<i>The British Medical Journal</i>	http://www.bmj.com
<i>The Journal of the American Medical Association</i>	http://jamanetwork.com
<i>The Lancet</i>	http://www.thelancet.com
<i>The New England Journal of Medicine</i>	http://www.nejm.org

V. TRAINING ASSESSMENT

The Therapeutic Endoscopy Fellowship Training Program focuses on procedural skill development; strong emphasis placed on clinical decision-making and procedural skill improvement. A multimodality model of assessment is used:

1. Performance will be monitored throughout the year. The site program director in charge of each rotation will submit a written evaluation within two weeks of the rotation's completion. Rotation evaluations should be discussed with and signed by trainees. Trainees are entitled to receive written mid-rotation feedback from the site program director. Each rotation should be completed successfully on a block basis; each block is composed of four months. The cumulative feedback of the in-training evaluation accounts for 20% of the total grade required to complete the training.
2. Fellows will be assessed by the local program director at the end of the year. Fellows who fail will be subject to the rules and regulations set by the SCFHS.
3. A logbook should be filled out with the procedures completed by trainees using the logbook form designed by the Scientific Committee. A completed logbook will account for 10% of the total grade. Therapeutic endoscopy includes several procedures such as sphincterotomies, baskets and balloon extractions, and stent insertions. Trainees should perform a total of 150 ERCP procedures during the one-year training program. The logbook should record the required minimum number of the following skills:
 - Scope positioning: 150 cases
 - Cannulation: 140 cases
 - Sphincterotomy: 60 cases
 - Stent insertion/exchange: 60 cases
 - Stone extraction; balloon/basket: 60 cases

The progressive evaluation of trainee skill development should follow the proposed map:

Training Period	Scope Positioning	Cannulation	Sphincterotomy	Stent Insertion/Exchange	Stone Extraction: Balloon/Basket
First Quarter (3 months)	30	20	10	10	10
Second Quarter (3 months)	40	40	15	15	15
Third Quarter (3 months)	40	40	15	15	15
Fourth Quarter (3 months)	40	40	20	20	20
Total number of cases	150	140	60	60	60

1. Continuous direct observation of procedural skills (DOPS) will be carried out every 2-3 months during the fellowship by the site program director. The trainee must successfully pass two out of four DOPS trials (see Supplement 1) at a competent level. A minimum of four attempts are permitted. Successful completion of continuous DOPS will account for 20% of the total grade.
2. The final examination will comprise DOPS rated independently by four experts. Trainees have to successfully pass two of the DOPS (see Supplement 1) at a competent level. Only two attempts are permitted. Successful completion of the final DOPS will account for 30% of the total grade.
3. A minimum of ten successful Mini Clinical Evaluation Examinations (Mini-CEX) are required to pass and will account for 10% of the total grade.
4. In order to successfully complete the fellowship, trainees are required to attain a minimum accumulative score of 70% for the assessment categories and pass the final DOPS.

A summary of assessment tools is depicted in this table:

TOOLS	WEIGHTAGE
Continuous DOPS	20%
In-training evaluation	20%
Research	10%
Mini- CEX	10%
Logbook	10%
Final DOPS	30%

VI. CERTIFICATION

Upon successful completion of the required training, a Saudi Board Certificate in Therapeutic Endoscopy will be conferred to the candidate.

b

VII. APPENDICES

Supplement 1: DOPS form

**ADULT GASTROENTEROLOGY TRAINING PROGRAM
ADULT ADVANCED ENDOSCOPY TRAINING PROGRAM
SUMMATIVE DIRECT OBSERVATION
OF PROCEDURES AND SKILLS (DOPS) OF ERCP**

الهيئة السعودية للتخصصات الصحية
Saudi Commission for Health Specialties



TRAINEE NAME:

DATE:

Scale & Criteria Key:
4 - Competent for independent practice; no supervisor required
3 - Minimal supervision; Trainer undertakes tasks requiring occasional supervision and verbal prompts
2 - Significant supervision; Trainee undertakes tasks requiring frequent supervision and verbal prompts
1 - Maximal supervision; Supervisor undertakes the majority of the tasks/decisions; & delivers constant verbal prompts
N/A - Not Applicable

NATIVE PAPILLA (no previous sphincter therapy)	Yes		No		SCORE
	Easy	Moderate	Complicated	Complicated	
CRITERIA					
SECTION 1: ASSESSMENT, CONSENT, COMMUNICATION	1	2	3	4	N/A
1.1 Obtains informed consent using a structured approach					
1.1.a Satisfactory procedural information					
1.1.b Risk & complications explained					
1.1.c Co-morbidity					
1.1.d Sedation					
1.1.e Allows opportunity for questions					
1.2 Demonstrates respect for patient's views & dignity during the procedure					
1.3 Communicates clearly with patient, including outcome of procedure with appropriate management & follow up plan. Full endoscopy report					
SECTION 2: SAFETY AND SEDATION	1	2	3	4	N/A
2.1 Safe and secure IV access					
2.2 Gives appropriate dose of analgesia and sedation and ensures adequate oxygenation and monitoring of patient					
2.3 Demonstrates good communication with the nursing staff, including dosage and vital signs					
SECTION 3: PREPERATION AND EQUIPMENT CHECK	1	2	3	4	N/A
3.1.a. Ensures all appropriate pre-procedure checks are performed as per local policies					
3.1.b. Ensures that all assisting staff are fully appraised of the current case					
3.1.c. Ensures that all medications and accessories likely to be required for this case are available					
3.2. Ensures the endoscope is functioning normally before attempting insertion					
SECTION 4: INTUBATION AND POSITIONING	1	2	3	4	N/A
4.1.a. Safe intubation of the esophagus					
4.1.b. Timely and straightforward duodenal intubation					
4.2.a. Identification of the ampulla					
4.2.b. Scope positioning relative to ampulla appropriate for intended Cannulation					
SECTION 5: CANNULATION AND IMAGING					
5.1.a. Selective Cannulation					
5.1.b. Effective use of wire to cannulate					
5.2.a. Safe and effective use of the contrast					
5.2.b. Screening time minimized					
5.2.c. Sufficiency of stored images to document case					
5.2.d. Interpretation of radiological images					

SECTION 6: EXECUTION OF SELECTED THERAPY	1	2	3	4	N/A
6.1. Decision of choosing appropriate therapy for the patient, indication and ERCP findings					
6.2.a. Safe technique of Sphincterotomy					
6.2.b. Appropriate size of sphincterotomy for indication					
6.3. STONE THERAPY					
6.3.a. Effective positioning of balloon relative to stone					
6.3.b. Wire control during stones extraction					
6.3.c. Effective use of basket					
6.3.d. Safe and effective use of lithotripter					
6.4. TISSUE SAMPLING					
6.4.a. Appropriate technique for indication and findings					
6.4.b. Safe use of the wire guided brush					
6.5. STENTING (PLASTIC/METALIC)					
6.5.a. Appropriate decision to stent					
6.5.b. Effective approximation of required length					
6.5.c. Appropriate choice of stent					

SECTION 7: ACTION TO MINIMIZE PANCREATITIS	1	2	3	4	N/A
7.1. Cannulation technique					
7.2. Minimize pancreatic contrast filling					
7.3. Medication usage unless contraindicated					
7.4. Appropriate use of pancreatic stent					
SECTION 8: COMPLICATIONS					
8.1. Recognize complication in a timely manner					
8.2. Effective management of immediate complications					
SECTION 9: POST PROCEDURE					
9.1. REPORT WRITING					
9.1.a. Indication outlined					
9.1.b. Accurate description of endoscopic and radiological findings					
9.1.c. Description of therapy					
9.1.d. Description of endotherapy					
9.1.e. Post ERCP management plan					
9.2. MANAGEMENT PLAN					
9.2.a. Verbal handover to nursing & medical staff					
9.2.b. Re assesses patient stability before movement for ongoing care/discharge					

Overall Degree of Supervision required	Maximal Supervision Supervisor undertakes the majority of the tasks/decisions & delivers constant verbal prompts	Significant Supervision Trainee undertakes tasks requiring frequent supervisor input and verbal prompts	Minimal Supervision Trainee undertakes tasks requiring occasional supervisor input and verbal prompts	Competent for independent practice no supervision required
Please tick appropriate box				

Total score

Total Score: _____ **x 25 =**

No. of Evaluated Items

Clear Pass	Borderline Pass	Borderline Fail	Clear Fail
>70%	60 69.4%	50 59.4%	< 50%

COMMENTS:

EVALUTOR NAME:

SIGNATURE:


DOPS Form Guidance and Description

DOPS Form Guidance and Descriptions	
PRE-PROCEDURE	
1-Indication	<ul style="list-style-type: none"> Assesses the appropriateness of the procedure and considers possible alternatives Procedure prioritized and undertaken at appropriate time of day (in/out-of-hours) Trainee able to state patient's history and indication for ERCP
2-Risk	<ul style="list-style-type: none"> Assesses comorbidity, including drug history Assesses any procedure-related risks relevant to patient Takes appropriate action to minimize any risks
3-Preparation	<ul style="list-style-type: none"> Ensures all appropriate pre-procedure checks are performed as per local policies Ensures that all assisting staff are fully apprised of the current case Ensures that all medications and accessories likely to be required for this case are available
4-Equipment Check	<ul style="list-style-type: none"> Ensures the available scope is appropriate for the current patient. Ensures the endoscope is functioning normally before attempting insertion
5-Consent	<ul style="list-style-type: none"> Intention of ERCP/alternatives Risks specific to ERCP Discussion with colleagues and relatives if patient lacks capacity
6-Sedation and monitoring	<ul style="list-style-type: none"> Appropriate doses of anesthesia Monitoring
INTUBATION AND POSITIONING	
7-Intubation <ul style="list-style-type: none"> Esophagus Duodenum 	<ul style="list-style-type: none"> Safe intubation of esophagus Timely and straightforward duodenal intubation
8-Visualization and position relative to ampulla	<ul style="list-style-type: none"> Identification of ampulla Scope positioning relative to ampulla appropriate for intended cannulation
9-Patient comfort	
CANNULATION AND IMAGING	
10-Selective Cannulation	<ul style="list-style-type: none"> Effective use of wire to cannulate
11-Wire management	<ul style="list-style-type: none"> Effective wire retention in duct of interest during procedure
12-Radiological aspects <ul style="list-style-type: none"> Image quality Interpretation 	<ul style="list-style-type: none"> Safe and effective use of contrast Screening time minimized Sufficiency of stored images to document case Interpretation of radiological images
EXECUTION OF SELECTED THERAPY	
13-Decision of appropriate therapy	<ul style="list-style-type: none"> Chooses appropriate therapy For patient, indication and ERCP findings
14-Sphincterotomy	<ul style="list-style-type: none"> Safe Appropriate size for indication
15-Sphincteroplasty	<ul style="list-style-type: none"> Appropriate-sized balloon Effective position across sphincter

DOPS Form Guidance and Descriptions	
16-Stone therapy	<ul style="list-style-type: none"> • Appropriate size • Effective positioning of balloon relative to stone • Wire control during stone extraction • Effective use of basket • Safe and effective use of lithotripter
17-Tissue sampling	<ul style="list-style-type: none"> • Appropriate technique for indication and findings • Safe use of wire-guided brush • Safe cannulation of duct for intraductal biopsies
18-Stenting: plastic	<ul style="list-style-type: none"> • Appropriate decision to stent • Effective approximation of required length • Appropriate choice of stent • Effective deployment in optimal position
19-Stenting: metal	<ul style="list-style-type: none"> • Appropriate decision to stent • Effective approximation of required length • Appropriate choice of stent • Effective deployment in optimal position
20-Actions to minimize pancreatitis	<ul style="list-style-type: none"> • Cannulation technique • Minimize pancreatic contrast filling • NSAID unless contraindication • Appropriate use of pancreatic stent
21-Complications	<ul style="list-style-type: none"> • Recognition and effective management of immediate complications
POST-PROCEDURE	
22-Report writing	<ul style="list-style-type: none"> • Indication outlined • Accurate description of endoscopic and radiological findings • Description of therapy • Description of endotherapy • Post ERCP management plan
23-Management plan	<ul style="list-style-type: none"> • Verbal handover to nursing and medical staff • Reassesses patient stability before movement for ongoing care/discharge
ENDOSCOPIC NON-TECHNICAL SKILLS (ENTS)	
24-Communication and teamwork	<ul style="list-style-type: none"> • Maintains clear communication with assisting staff • Gives and receives knowledge and information in a clear and timely fashion • Ensures that both the team and the endoscopist are working together, using the same core information and understand the “big picture” of the case • Ensures that the patient is at the center of the procedure, emphasizing safety and comfort • Clear communication of results and management plan with patient and/or caregivers
25-Situation awareness	<ul style="list-style-type: none"> • Ensure procedure is carried out with full respect for privacy and dignity • Maintains continuous evaluation of the patient's condition

DOPS Form Guidance and Descriptions	
	<ul style="list-style-type: none"> • Ensures lack of distractions and maintains concentration, particularly during difficult situations • Intraprocedural changes to scope setup monitored and rechecked
26-Leadership	<ul style="list-style-type: none"> • Provides emotional and cognitive support to team members by tailoring leadership and teaching style appropriately • Supports safety and quality by adhering to current protocols and codes of clinical practice • Adopts a calm and controlled demeanor when under pressure, utilizing all resources to maintain control of the situation and taking responsibility for patient outcome
27-Judgment and decision-making	<ul style="list-style-type: none"> • Considers options and possible courses of action to solve an issue or problem, including assessment of risk and benefit • Communicates decisions and actions to team members prior to implementation • Reviews outcomes of procedure or options for dealing with problems • Reflects on issues and institutes changes to improve practice

Supplement II: Mini-CEX

ADULT GASTROENTEROLOGY TRAINING PROGRAM MINI-CLINICAL EVALUATION EXERCISE (CEX)		الهيئة السعودية للتخصصات الصحية Saudi Commission for Health Specialties			
Name:	Level of Training:	F1	F2	F3	
Hospital:	Rotation:			Date:	
Setting:	<input type="radio"/> Ambulatory	<input type="radio"/> In-patient	<input type="radio"/> Other		
Patient:	Age: _____	Sex: _____	<input type="radio"/> New	<input type="radio"/> Follow up	
Complexity:	<input type="radio"/> Low	<input type="radio"/> Moderate	<input type="radio"/> High		
Focus:	<input type="radio"/> Data Gathering	<input type="radio"/> Diagnosis	<input type="radio"/> Therapy	<input type="radio"/> Counseling	
		DISATISFACTORY	SATISFACTORY	SUPERIOR	Not Applicable
Medical Interviewing Skills	1 2	3	4	5	N/A
Physical Examination Skills	1 2	3	4	5	N/A
Humanistic Qualities/Professionalism	1 2	3	4	5	N/A
Clinical Judgment	1 2	3	4	5	N/A
Counseling Skills	1 2	3	4	5	N/A
Organization/Efficiency	1 2	3	4	5	N/A
Overall Clinical Competence	1 2	3	4	5	N/A
Mini-CEX Time:	Observing _____ Mins	Providing Feedback: _____ Mins			
	Clear Pass >70%	Borderline Pass 60-69.4%	Borderline Fail 50-59.4%	Clear Fail < 50%	
Evaluator's Name & Signature	Fellow's Signature		RTP Director's Signature		

Descriptions of Competencies Demonstrated During the MINI-CEX

- 1. Medical Interviewing Skills:** Facilitates patient's telling of story; effectively uses questions/directions to obtain accurate adequate information needed; responds appropriately to affect, non-verbal cues.
- 2. Physical Examination Skills:** Follows efficient, logical sequence; balances screening/diagnostic steps for problem; informs patient; sensitive to patient's comfort, modesty.
- 3. Humanities Qualities/Professionalism:** Shows respect, compassion, empathy, establishes trust; attends to patient's needs of comfort, modesty confidentiality, information.
- 4. Clinical Judgment:** Selectively orders/performs appropriate diagnostic studies, considers risks, benefits.
- 5. Counseling Skills:** Explains rationale for test/treatment obtains patient's consent, educates/counsels regarding management.
- 6. Organization/Efficiency:** Prioritizes, is timely, succinct.
- 7. Overall Clinical Competence:** Demonstrates judgment, synthesis, caring, effectiveness, and efficiency.