BWP Belgian Week of Pathology

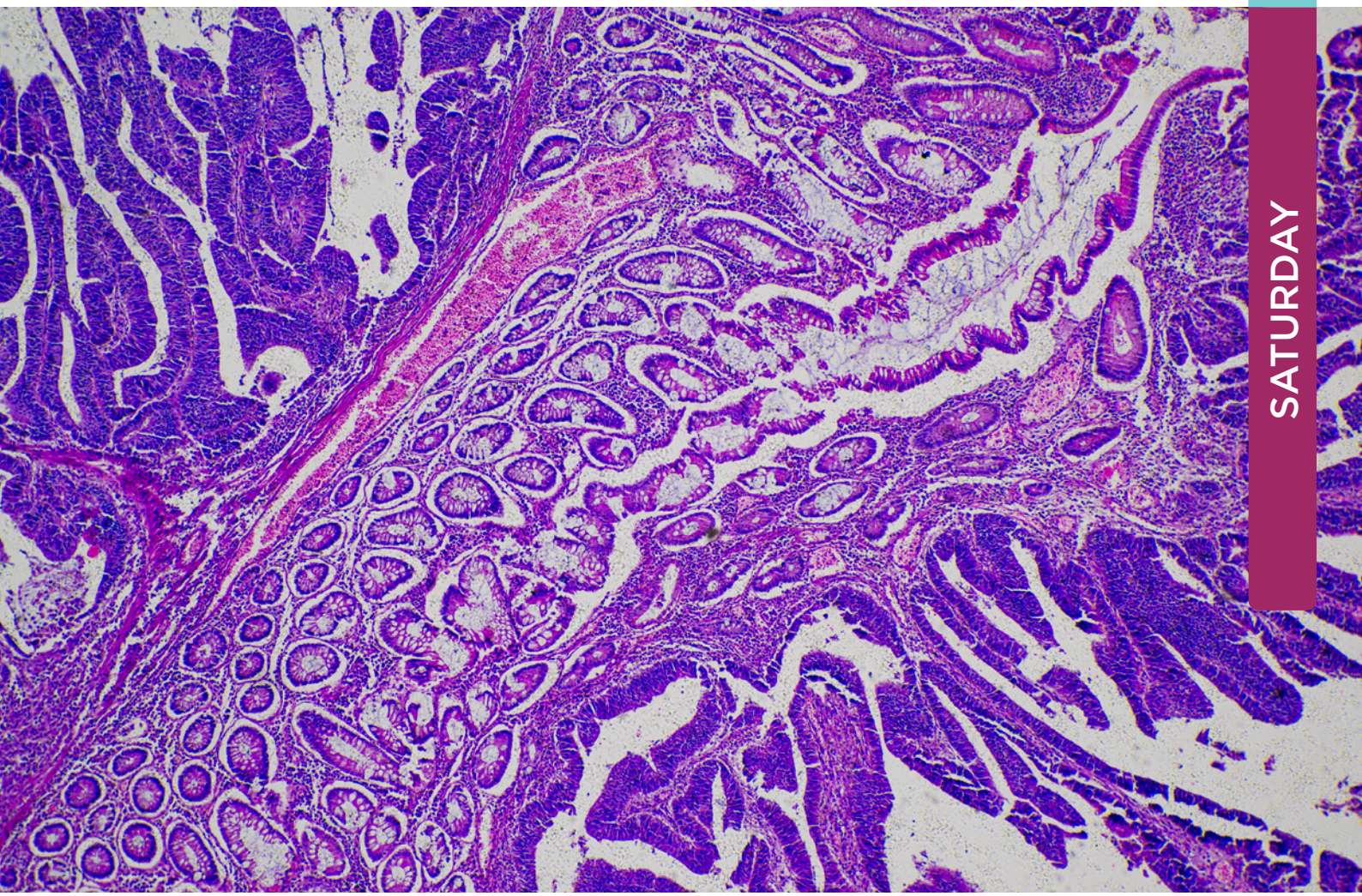
12th BELGIAN WEEK OF PATHOLOGY

21.10 > 22.10.22

@ TANGLA HOTEL

FRIDAY

SATURDAY



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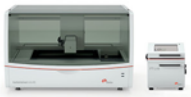

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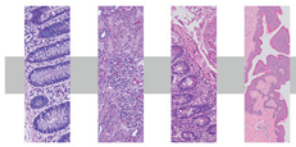

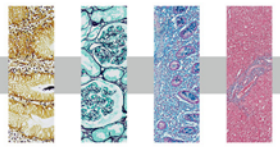

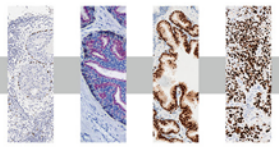

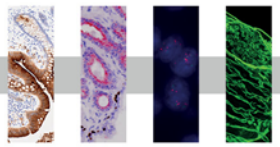

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WELCOME

Dear Colleagues and Friends,

On behalf of the Belgian Society of Pathology, it is our pleasure to welcome you at the **12th edition of the Belgian Week of Pathology (BWP), at the Tangla Hotel in Brussels, on October 21-22, 2022.**

The previous editions of the BWP were a huge success and also this year, the different Working Groups of the Belgian Society have outdone themselves to put together a great program focusing on areas of direct practical relevance to general surgical pathologists. As our professional landscape and the world around us are constantly evolving, the BWP also evolves to remain at the frontline of meetings where we can share knowledge and experience.

The Key Note topic of this year will be on Urologic Pathology. State-of the-Art lectures will be provided by some of the European leading expert uropathologists: prof. dr. Yves Allory from the Institut Curie in Paris and prof. dr. Arno van Leenders from the Erasmus MC in Rotterdam.

For our Educational Grant Symposium we are honoured to introduce a special guest from the Brigham & Women's Hospital (Harvard Medical School) in Boston: prof. dr. Christopher Fletcher. Drawing on his vast experience he will share his vision on how surgical pathology should evolve?

Our comprehensive and rich program will also cover advances in pathology diagnosis, new classifications, guidelines and quality assessment. Two eminent and worldwide renowned breast pathologists, prof. dr. Ian Ellis and prof. dr. Emad Rakha promised to join us from Nottingham. Prof. dr. Chris Vandenbussche from Hopkins (USA) will talk about the Paris System for urine cytology, prof. dr. Bernard Cribier (France) will teach us more on dermatopathology, and prof. dr. Norman Carr (UK) will elaborate on LAMN and PMP in Appendiceal pathology.

For the Ethics and Economy session of this year's BWP2022, our international faculty from France, Portugal, Belgium and the Netherlands will cover Computational Pathology, Digital Pathology, implementation of Artificial Intelligence and Synoptic Reporting.

Like every year, we encouraged residents to present their work by submitting abstracts, and we are looking forward to award are the prices of the Belgian Week of Pathology 2022 for excellent research and for presenting difficult and interesting disease entities.

Don't miss this year's Pathology Congress dinner on Friday night: here you can reunite with your colleagues and with the expert speakers from around the world. Last year we had a vibrant and lively atmosphere till the early hours of the morning. The relationships you forge here will last throughout your career!

Last but not least, our congress will be accompanied by a major exhibition. The BWP 2022 gratefully acknowledges our partners from the industry for their renewed and ongoing support! It is always a pleasure to continue our constructive collaboration.

We look forward to seeing you here in Brussels at the 12th Belgian Week of Pathology !

Koen VAN DE VIJVER

President of the Belgian Week of Pathology

Vasiliki SIOZOPOULOU

Vice-president of the Belgian Week of Pathology

Pieter DEMETTER

President of the Belgian Society of Pathology

We are leading a revolution in oncology to redefine cancer care

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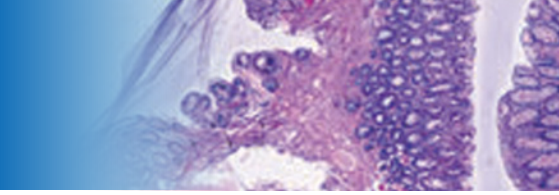
NS ID XL-2898-Revision date 09/2022-LB Local code 1227

GENERAL INFORMATION



Accreditation

Accreditation has been requested with the INAMI/RIZIV for ethics and economy as well as anatomo-pathology.
Submission is done on the computers available in the exhibition area.
Submission is requested twice a day on Friday, and only once on Saturday. For ethics and economy a physical signature will be additionally asked at the beginning of the session.

Language

The language of the congress is English (British spelling) for abstracts, slides and announcements.

Abstracts

Authors were invited to submit abstracts until July 11, 2022.
The result of evaluation was sent to the first authors during the month of August 2022.

- Oral presentations will be presented during the related sessions
- e-Poster presentations will take place during the morning and afternoon coffee breaks and lunch of Friday October 21 and Saturday October 22.

e-Posters will be displayed during the congress on the assigned screens in the Exhibition Area.

The Belgian Week of Pathology and the Belgian Society of Pathology will award:

- the Best Oral Presentation: Research (500€)
- the Best Oral Presentation: Case report (500€)
- Best e-Poster (500€).

Venue

TANGLA Hotel Brussels
5, Avenue Emmanuel Mounier
1200 Brussels

Parking available

Parking: Several possibilities during the 3 days

- the Parking of the Tangla Hotel is available, the cost per day will be 5€ per day: 120 spaces
- the Q-Parc of Hospital Saint-Luc
- along Avenue Mounier with time restriction, the Parking disc is mandatory.

Event Coordinator

DME Events
Anne-France De Meyer - 57, Av. G. Demey - 1160 Brussels - Belgium
Mobile: +32 477 27 00 45
E-mail: anne.france.de.meyer@dme-events.eu

FRIDAY

SATURDAY

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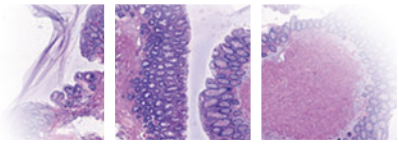
INDEX

FRIDAY

SATURDAY



FRIDAY

SATURDAY

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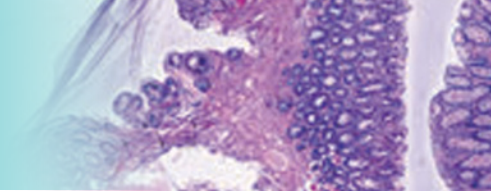
FRIDAY

SATURDAY



FRIDAY

■ ROYAL 2 & 3 ■ ROYAL 1

FRIDAY 21/10

08.00-09.00	WELCOME
09.00-10.30	■ Surgical Pathology ■ Breast Pathology
10.30-11.15	COFFEE BREAK + e-POSTER TOUR
10.40-11.10	YOUNG PATHOLOGIST SECTION
11.15-12.45	■ Surgical Pathology ■ Molecular Pathology
12.45-14.00	LUNCH + e-POSTER TOUR
14.00-15.00	■ EDUCATIONAL GRANT SYMPOSIUM: Christopher FLETCHER (Boston,USA)
15.00-15.45	COFFEE BREAK + e-POSTER TOUR
15.45-17.45	■ Soft Tissue Pathology ■ Hematopathology
18.00-19.00	■ KEYNOTE lecture: Urological Pathology
19.00-23.00	COCKTAIL RECEPTION AND DINNER AT THE TANGLA HOTEL

ROYAL 2 & 3 ROYAL 1

SATURDAY 22/10

08.00-09.00 WELCOME

08.30-09.00 YOUNG PATHOLOGIST SECTION

09.00-10.30 Cytopathology
Dermatopathology

10.30-11.15 COFFEE BREAK + e-POSTER TOUR

10.40-11.10 SATELLITE SYMPOSIUM:
ASTRAZENECA

11.15-12.45 Cytopathology
Gastrointestinal Pathology

12.45-14.00 LUNCH + e-POSTER TOUR

13.00-13.20 GENERAL ASSEMBLY BELGIAN SOCIETY OF PATHOLOGY

13.20-13.50 SATELLITE SYMPOSIUM:
BMS

14.00-16.00 Urological Pathology

16.00-16.15 AWARDS CEREMONY + CLOSING OF THE CONGRESS OF THE BWP 2022

Educational Grant Symposium

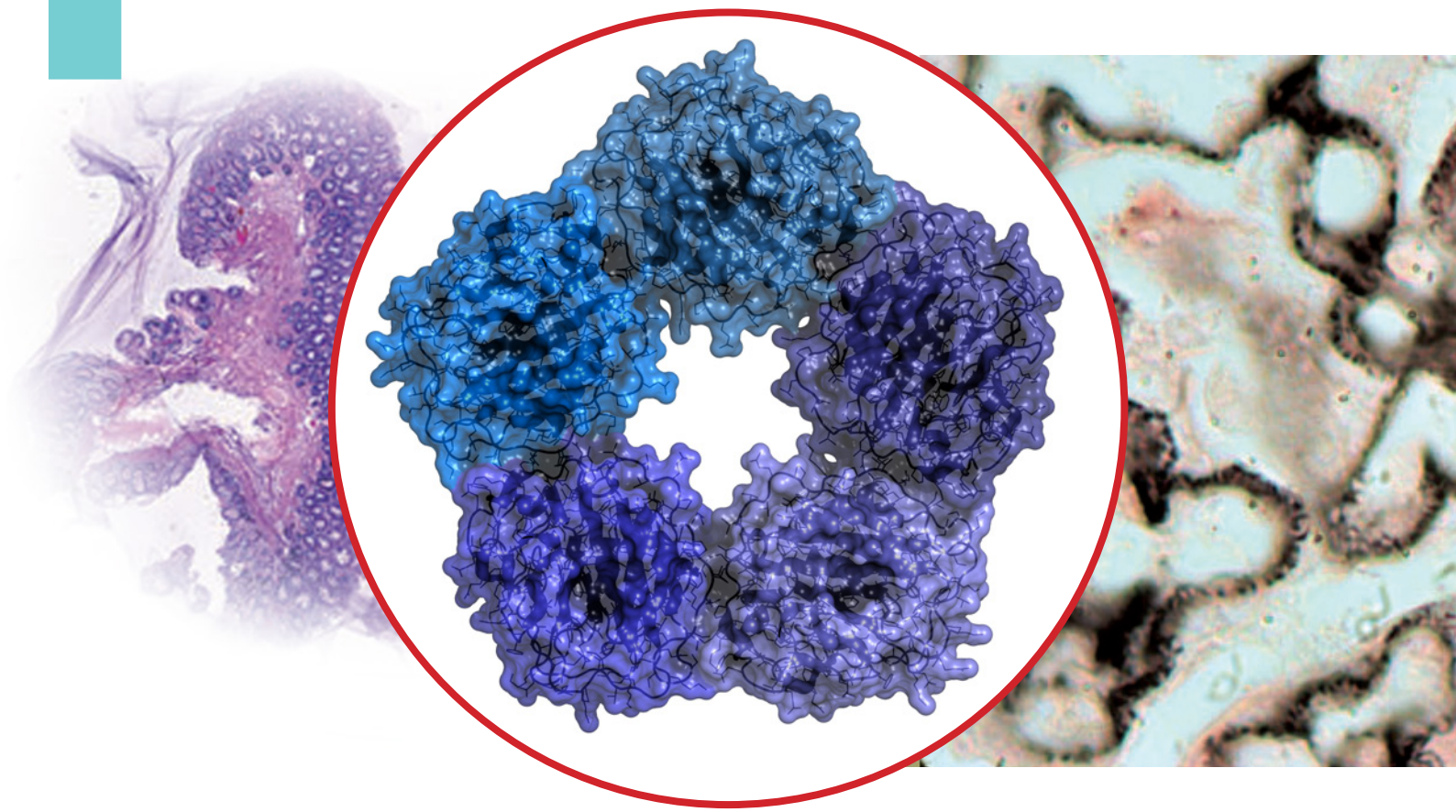
Royal 2&3

FRIDAY

14.00-15.00

How should surgical pathology evolve?

PROF FLETCHER CHRISTOPHER (Boston, USA)



Organised thanks to the Educational Grant

with the kind support The Belgian Society of Pathology

BWP Belgian Week of Pathology

BSP Belgian Society of Pathology

08.00-09.00 **WELCOME**

09.00-10.30

ROYAL 2&3

SURGICAL PATHOLOGY: COMPUTATIONAL PATHOLOGY

Moderator: Philippe Delvenne (Liège)

- 09.00 • Implementation of digital pathology in daily practice and artificial Intelligence applications.
  KAMMERER-JACQUET Solène-Florence (Rennes, France)
- 09.45 • Implementation of Synoptic Reporting, the Dutch way
  SEEGERS Paul (Houten, The Netherlands)
- 10.15 • *Oral Presentation of a Case Report (by trainee, 15'):* 'An extraskeletal breast osteosarcoma. In the molecular era, sampling is key, back to the roots.'
  Ali Ramadhan (Brussels)

ROYAL 1

BREAST PATHOLOGY

Moderator: Giuseppe Floris (Leuven)

- 09.00 • B3 lesions, challenges in the diagnosis on core needle biopsies
  RAKHA Emad (Nottingham, UK)
- 09.40 • Grading in breast cancer.
  ELLIS Ian (Nottingham, UK)
- 10.15 • *Oral Presentation of a Research Topic (by trainee, 15')*: 'Morphological and immunohistochemical heterogeneity of breast cancer metastases.'
  Maxim De Schepper (Leuven)

10.30-11.15 **COFEE BREAK & POSTERS TOUR**

10.40-11.10 **YOUNG PATHOLOGIST SECTION (ROYAL 2&3)**

Moderators: Fleur Cordier (Gent), Melek Ahmed (Antwerp), Frédéric Lifrange (Liège)

11.15-12.45

ROYAL 2&3

SURGICAL PATHOLOGY: COMPUTATIONAL PATHOLOGY

Moderator: Philippe Delvenne (Liège)

- 11.15 • The impact of digital pathology and AI implementation in the routine of a pathology laboratory.
  ELOY Catarina (Porto, Portugal)
- 12.00 • Structured reporting in Belgium: a pilot
  DENDOOVEN Amélie (Gent)
- 12.30 • *Oral presentation of a Research Topic:* 'Morphological deconvolution of tumor heterogeneity in triple negative breast cancers using an image processing software.'
  Frédéric Lifrange (Liège)

ROYAL 1

MOLECULAR PATHOLOGY

Moderators: Nicky D'Haene (Brussels)
Patrick Pauwels (Antwerp)

- 11.15 • Molecular Pathology, case presentations
  Speakers: Working Group of Molecular Pathology
- 11.40 • Molecular Pathology of thyroid neoplasms
  D'HAENE Nicky (Brussels)
- 12.05 • Molecular pathology of renal carcinoma
  VAN MONTFOORT Maurits (Amsterdam, The Netherlands)
- 12.30 • *Oral Presentation of a Case Report:* 'PTPRZ1-MET fusion in IDH wild-type glioblastoma: Targeting MET pathway in glial tumors.'
  Jennifer Fallas (Brussels)

FRIDAY

FRIDAY October 21 - 19.00-23.00

COCKTAIL RECEPTION AND DINNER AT TANGLA HOTEL

TANGLA

BRUSSELS

12.45-14.00 **LUNCH & e-POSTERS TOUR**

14.00-15.00 **EDUCATIONAL GRANT SYMPOSIUM: (ROYAL 2&3)**

Moderator: David Creytens (Gent)

- How should surgical pathology evolve?
  Prof FLETCHER Christopher (Boston, USA)

15.00-15.45 **COFFEE BREAK & e-POSTERS TOUR**

15.45-17.45

ROYAL 2&3

SOFT TISSUE PATHOLOGY

Moderators: David Creytens (Gent),
Patrick Pauwels (Antwerp),
Raf Sciot (Leuven),
Nicolas de Saint Aubin (Brussels)

15.45 • Homage to Prof. Chris Fletcher"
Case presentations

ROYAL 1

HEMATOPATHOLOGY

Moderators: Joan Somja (Liège)
Amélie Dendooven (Gent)
Thomas Tousseyn (Leuven)

15.45 • The 2022 updated classification of B-cell lymphomas
TRAVERSE-GLEHEN Alexandra (Lyon, France)

16.45 • The 2022 updated classification of T-cell lymphomas
GAULARD Philippe (Paris, France)

18.00-19.00 **KEYNOTE LECTURE: UROLOGICAL PATHOLOGY (ROYAL 2&3)**

Moderators: Sandrine Rorive (Brussels)
Louis Libbrecht (Kortrijk/Brussels)

- Molecular pathways of urothelial cancer.
  ALLORY Yves (Institut Curie et Hôpital Foch, France)

19.00-23.00 Cocktail Reception and Dinner at Tangla Hotel

The new in vitro diagnostic regulation (IVDR) has arrived in Europe

Please join us for the AstraZeneca satellite symposium during the Belgian week of Pathology

Saturday October 22, 10:40 - 11:10 Room Royal 1

Implications of the IVDR on clinical trials and routine clinical testing for precision medicine,
Patrick Fivey, Director Precision Medicine Policy, AstraZeneca

Implications of the IVDR in Belgium on anatomic pathology,
Romaric Croes, MD, az Sint-Blasius

NS ID BE-2934-Revision date 09/2022-LB

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SATURDAY October 22 - Morning

08.00-09.00 **WELCOME**

08.30-09.00 **ROYAL 2&3**

YOUNG PATHOLOGIST SECTION

Moderators: Fleur Cordier (Gent), Melek Ahmed (Antwerp), Frédéric Lifrange (Liège)

08.30-09.00 **CYTOPATHOLOGY**

Moderator: Shaira Sahebali (Brussels)

09.00 • The Paris System
VANDENBUSSCHE Christopher (John Hopkins, Baltimore, USA)

09.45 • Update to the Belgian Follow-up Guidelines for Abnormal Screening Results
BOURGAIN Claire (Bonheiden)

ROYAL 1

DERMATOPATHOLOGY

Moderators: Jonathan Eben (Sint-Niklaas), Francesca Bosisio (Leuven)

09.00 • Classification of adnexal skin tumors
CRIBIER Bernard (Strasbourg, France)

09.45 • Cutaneous squamous cell carcinoma and basal cell carcinoma: classification and challenges
MOOYAART Antien (Rotterdam, The Netherlands)

10.15 • *Oral Presentation of a Research Topic:* 'The challenging differential diagnosis of ALK-positive cutaneous lesions, a case series.'
Lotte Keulen (Antwerpen)

10.30-11.15 **COFFEE BREAK & POSTERS TOUR**

10.40-11.10 **SATELLITE SYMPOSIUM ASTRAZENECA (ROYAL 1)**

• Implications of the IVDR on clinical trials and on pathology labs in Belgium
CROES Romaric (Dendermonde), FIVEY Patrick (AstraZeneca, UK)

11.15-12.45 **ROYAL 2&3**

CYTOPATHOLOGY

Moderator: Shaira Sahebali (Brussels)

11.15 • Urine cytology, slide seminar.
VANDENBUSSCHE Christopher (John Hopkins, Baltimore, USA)

12.30 • *Oral Presentation of a Case Report:* 'Monomicrobial necrotizing fasciitis and emphysematous cystitis : Autopsy report'.
Stefan Rusu (Brussels)

ROYAL 1

GASTROINTESTINAL PATHOLOGY: APPENDICEAL PATHOLOGY

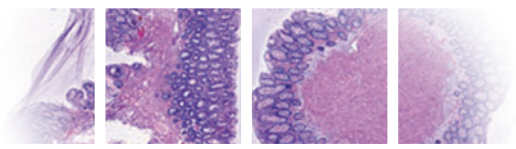
Moderators: Ann Driessen (Antwerpen), Laurine Verset (Brussels)

11.15 • Inflammatory disorders
BALDIN Pamela (Brussels)

11.40 • Neuroendocrine tumors and goblet cell adenocarcinoma
HOORENS Ann (Gent)

12.05 • Low grade Appendiceal Mucinous Neoplasia and Pseudomyxoma Peritonei
CARR Norman (Basingstoke, UK)

SATURDAY



BMS Satellite Symposium

Saturday, October 22nd, 13:20 – 13:50
Tangla Hotel, Brussels

"I like bananas and you like banahnahs":

a PD-L1 debate among pathologists
Emerging trends on PD-L1 testing in Muscle-Invasive Urothelial Carcinoma and Upper GI cancers

13:20 - 13:50

Expert panel discussion

Dr Vasiliki Siozopoulou
& **Prof Nicky D'Haene**.
Moderated by **Dr Roberto Salgado**

ONC-BE-2200192 date of prep. 09/22

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SATURDAY October 22 - Afternoon

12.45-14.00 LUNCH & e-POSTER TOUR

13.00-13.20 GENERAL ASSEMBLY **BELGIAN SOCIETY OF PATHOLOGY (ROYAL 1)**

13.20-13.50 SATELLITE SYMPOSIUM BY **BMS (ROYAL 2&3)**

- I like bananas and you like banahnahs: aPD-L1 testing in Muscle-Invasive Urothelial Carcinoma and Upper GI cancers.
  Moderator: Roberto Salgado (Antwerpen)
  SIOZOPOULOU Vasiliki (Antwerpen), D'HAENE Nicky (Brussels)

14.00-16.00 **ROYAL 2&3**

UROLOGICAL PATHOLOGY

Moderator: Marcella Baldewijns (Leuven),
Jonathan Eben (St-Niklaas)

14.00 • Second "keynote" Uropathology
Prostate cancer grading beyond Gleason score
VAN LEENDERS Arno (Rotterdam, The Netherlands)

15.00 • Belgian recommendations for prostatectomy handling and reporting
LIBBRECHT Louis (Kortrijk/Brussels)

15.10 • Bladder and prostate pathology, case presentations.
Speakers: Working Group of Urological Pathology

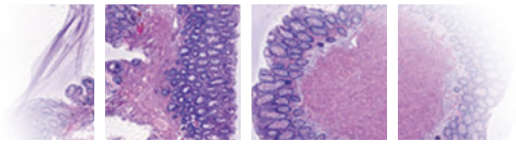
16.00-16.15 **AWARDS CEREMONY (ROYAL 2&3)**

- Certificates for the first Molecular Pathology Course by the Belgian Society of Pathology
- Prizes of the BWP 2022 for best Oral and Poster Presentations

CLOSING CEREMONY BWP 2022

BWP Belgian Week of Pathology

SATURDAY

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C16	HAMAMATSU
C17	CARL ZEISS
C18	AGENDIA
C19	CANCER Registration

FRIDAY

SATURDAY

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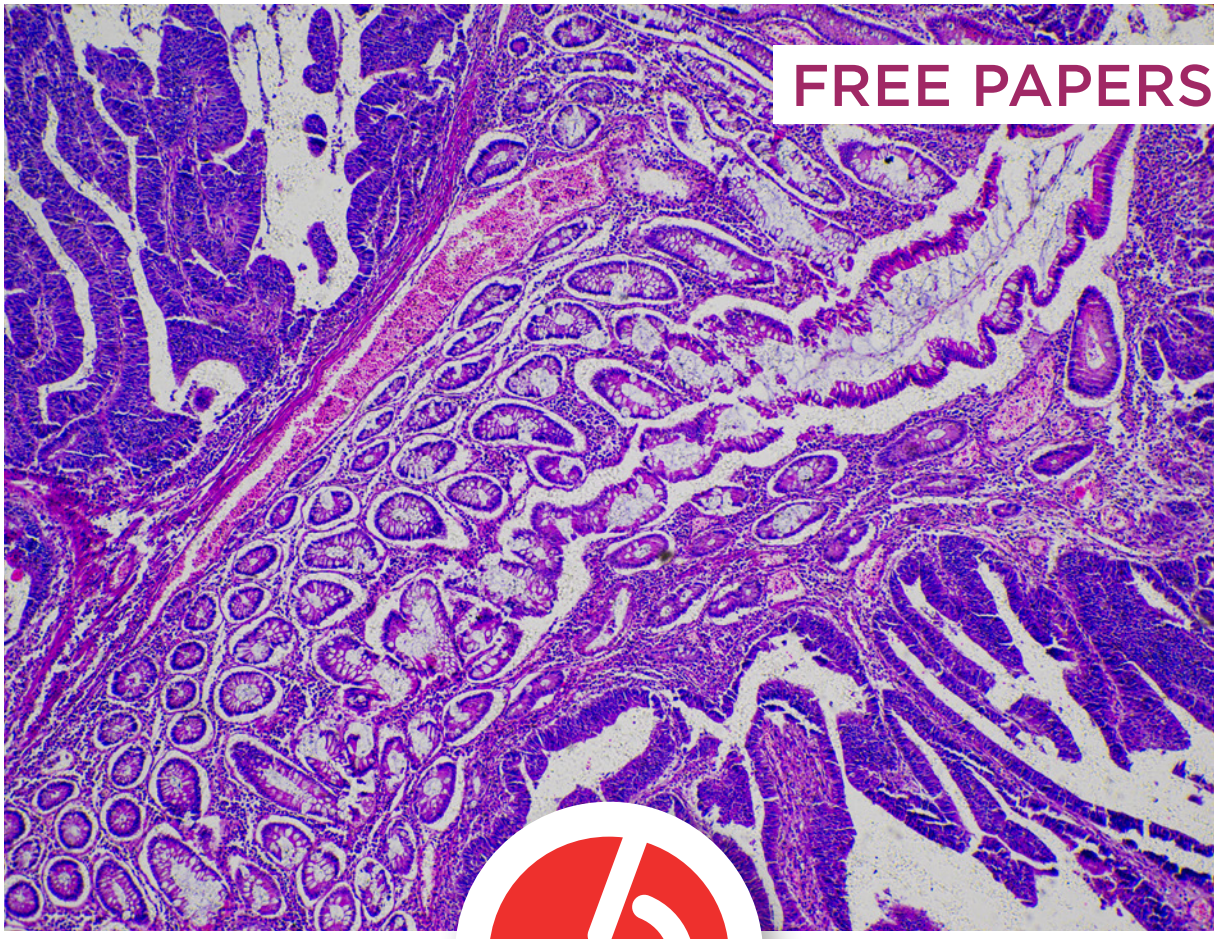

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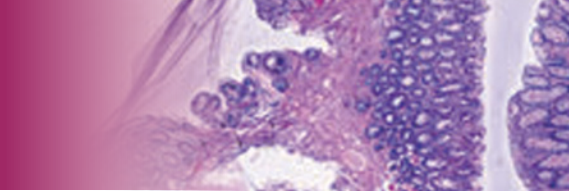

O 01	Jennifer Fallas (ULB-B)	PTPRZ1-MET fusion in IDH wild-type glioblastoma: Targeting MET pathway in glial tumors.	P 25
O 02	Stefan Rusu (ULB-E)	Monomicrobial necrotizing fasciitis and emphysematous cystitis : Autopsy report	P 26
O 03	Ali Ramadhan (UZB)	An extraskeletal breast osteosarcoma. In the molecular era, sampling is key, back to the roots.	P 27
O 04	Maxim De Schepper (KUL)	Morphological and immunohistochemical heterogeneity of breast cancer metastases	P 28
O 05	Frédéric Lifrange (ULG)	Morphological deconvolution of tumor heterogeneity in triple negative breast cancers using an image processing software.	P 29
O 06	Lotte Keulen (UZA)	The challenging differential diagnosis of ALK-positive cutaneous lesions, a case series.	

O 01

PTPRZ1-MET FUSION IN IDH WILD-TYPE GLIOBLASTOMA: TARGETING MET PATHWAY IN GLIAL TUMORS

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Background and objective

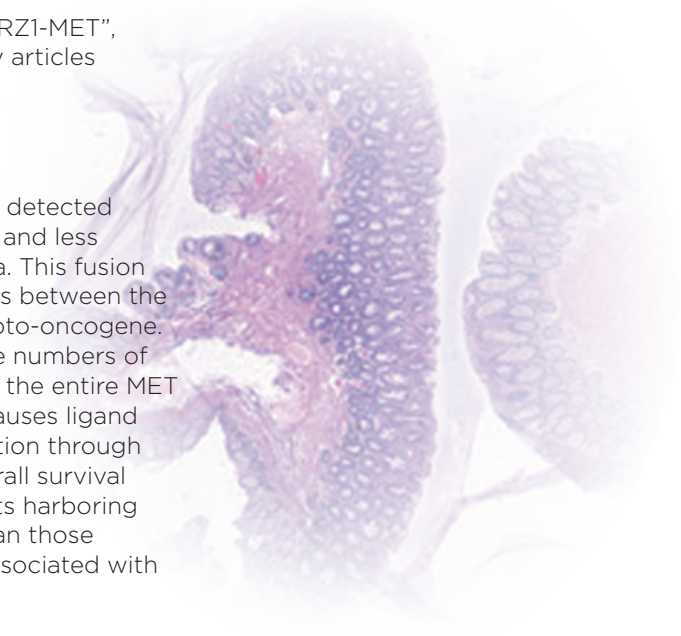
A 52-year-old woman was referred for progression of a glioblastoma partially resected eight months ago and treated by adjuvant Temozolomide and radiotherapy. Five months after surgery, imaging work up had already revealed progressive disease. The tumor harboured TERT promoter, TP53 and BRCA2 mutations. There was no MGMT promoter methylation. Gene fusion research highlighted PTPRZ1-MET fusion. The aim of this case presentation is to review the role of PTPRZ1-MET fusion in gliomagenesis and to investigate potential therapeutic targets.

Material and methods

We used specific terms (e.g. "PTPRZ1-MET", "PTPRZ1",...) in Pubmed to identify articles addressing PTPRZ1-MET fusion.

Discussion

PTPRZ1-MET fusion (ZM fusion) is detected in 15% of secondary glioblastoma, and less frequently in primary glioblastoma. This fusion is the result of translocation events between the introns of PTPRZ and the MET proto-oncogene. Fusion transcripts contain variable numbers of PTPRZ1 extracellular domains and the entire MET intracellular domain. This fusion causes ligand independent MET pathway activation through autophosphorylation of MET. Overall survival of secondary glioblastoma patients harboring ZM fusion is significantly lower than those without ZM fusion. ZM fusion is associated with poor progression-free survival in IDH-wild type glioblastoma. In vitro studies confirmed that ZM fusion leads to more aggressive behaviour and resistance to Temozolomide. Some clinical studies used MET inhibitors in glioblastoma treatment and observed partial response to therapy. Identification of ZM fusion offers the possibility of additional therapeutic options for glioblastoma patients.



O 02

MONOMICROBIAL NECROTIZING FASCIITIS AND EMPHYSEMATOUS CYSTITIS: AUTOPSY REPORT

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Background and objective

Necrotizing fasciitis (NF) is a fulminant infection of the deep soft tissues, characterized by high risk of sepsis and mortality. Emphysematous cystitis (EC) is a rare form of complicated urinary tract infection and its association with NF is uncommon. We wish to present the autopsy findings in such association.
Material and methods:
We report a case of a patient with severe comorbidities who developed fatal NF despite prompt surgical intervention and antibiotic treatment.

Results

A 65-year-old male patient presented to the emergency room (ER) for rapid deterioration of general condition and with left leg above-knee erythema. He had a history of right hepatectomy complicated by biliary-colonic fistula for hepatocellular carcinoma, right nephrectomy for clear cell renal cell carcinoma, severe malnutrition and chronic pancreatitis. Clinical diagnosis of NF was made based on rapid progression of tissue lesions and the presence of cutaneous emphysema. Broad spectrum antibiotic including clindamycin were given shortly after arrival and an emergency debridement of the left thigh was performed. Despite the prompt management, the subcutaneous emphysema extended to gluteal, scrotal regions and to posterior abdominal wall muscles. Contrast-enhanced computed tomography also revealed bladder pneumatosis. Tissue cultures revealed Clostridium perfringens. The evolution was complicated by distributive shock and subsequently by multiple organ failure leading to death within 24 hours after ER admission.

Autopsy findings included swollen, edematous, and discolored areas around the debrided site, heterogeneous pulmonary consolidation and « cobblestone » appearance of bladder mucosal surface, corresponding microscopically to persistence of NF, bronchopneumonia and EC, respectively.
While association between bowel and bladder pneumatosis have been described, few reports describing histological alterations encompassing both NF and EC are available.

Conclusion

Clostridium perfringens causes life-threatening bacterial infections in the form of NF and gas gangrene that may lead to death. Autopsy practice provides histological proof and helps in the understanding of this uncommon disease.

O 03

AN EXTRASKELETAL BREAST OSTEOSARCOMA. IN THE MOLECULAR ERA, SAMPLING IS KEY, BACK TO THE ROOTS

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Background and objective

Osteosarcoma is the most common primary malignant tumor of bone in young adults, but the extraskeletal variety is very uncommon. It accounts for approximately 2-4 % of all osteosarcomas, and 1 % of soft tissue sarcomas. So far, about 150 cases have been reported in the literature. Like their skeletal counterparts, osteosarcomas of the breast may have single or multiple subtypes. In our case, we demonstrate a different morphological subtypes including osteoblastic, chondroblastic and fibroblastic by meticulous examination of the samples received.

Case

A previously healthy 58-year-old female presented to our hospital complaining of a right breast mass in the upper outer quadrant. The primary work up revealed that the right breast was occupied by voluminous solid-cystic mass with presence of enlarged lymph nodes in the right axillary region. In addition, there were no distant metastases at this stage.

Diagnostic work up

Microscopic examination of the tru-cut showed a high-grade spindle cell lesion with mitoses including atypical ones. The tumor contained many osteoclast- giant cells associated with osteoid deposition (Trichrome). There was no evidence of any epithelial component both morphologically and immunohistochemically. The hormone receptor study for ER, PR as well HER2 were negative. The mastectomy specimen received later on revealed high histological grading (Grade 3). The response to the pre-adjuvant chemotherapy was estimated as 70% necrosis, 30% vital tumor cells. Two positive lymph nodes were retrieved. Frequent simultaneous loss of protein expression detect by immunohistochemistry for both TP53 and RB1.

Conclusion

Extraskeletal osteosarcoma is a rare tumor; its localization in the breast makes it an exceedingly infrequent one. Thorough histopathological evaluation , exclusion of bony origin, presence of neoplastic bone or cartilage and absence of epithelial components are prerequisites for making the diagnosis. The use of immunohistochemical and molecular techniques contributes to the accuracy of the diagnosis.

O 04

MORPHOLOGICAL AND IMMUNOHISTOCHEMICAL HETEROGENEITY OF BREAST CANCER METASTASES

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Background and objective

Metastatic disease occurs in 20-30% of breast cancer patients, eventually resulting in death. Here, treatment is mainly based on primary tumor characteristics, neglecting inter and/or intra- metastatic lesion (ML) heterogeneity. Our aim was to investigate intra-patient primary/metastasis and inter-metastasis tumor heterogeneity morphologically and immunohistochemically (IHC) on a series of metastatic breast cancer patients from a post-mortem tissue donation study.

Material and methods

Rapid autopsy was performed within the context of the UPTIDER program (NCT04531696). Metastatic lesions were sampled and compared with one another and with the primary tumor on H&E. IHC staining was performed for Estrogen Receptor (ER) (EP1, DAKO, RTU), Progesteron Receptor (PR) (PgR1294, DAKO, RTU), Human Epidermal growth factor Receptor 2 (HER2) (HercepTestTM, DAKO, RTU) and Ki67 (MIB1, DAKO, RTU).

Results

Rapid autopsies were performed on 12 patients, with a median post-mortem interval of 3h (range: 2h-4,5h). A median of 41,5 ML (151 samples) was obtained. On H&E intra- and inter- ML morphological heterogeneity was observed in 4 patients, meaning occurrence of a histotype switch or presence of subclonal regions with distinctive nuclear pleomorphism. Immunohistochemically, three patients were triple negative at diagnosis and remained ER- and PR- in all ML. Nine patients were ER+ at diagnosis, of which three retained ER expression in all ML. The other six lost ER expression in 6%-86% of the ML. Eight patients were PR+ at diagnosis. Three of them lost PR in all lesions, five lost PR expression in 37%-96% of all lesions. Ki67 was heterogeneous, within and between patients, with median IQR of 16,13% (range: 5-32%). One patient presented with HER2-amplification at diagnosis. Here, intra-lesion heterogeneity for HER2-immunoscore was recorded in 31% of her ML.

Conclusion

In this study, we demonstrate clinically relevant heterogeneity of metastatic disease, especially in ER+ breast cancer patients, suggesting that one single metastatic biopsy does not reflect the entire metastatic disease.

O 05

MORPHOLOGICAL DECONVOLUTION OF TUMOR HETEROGENEITY IN TRIPLE NEGATIVE BREAST CANCERS USING AN IMAGE PROCESSING SOFTWARE

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Background and objective

Triple negative breast cancer (TNBC) is poor prognosis disease with few dedicated treatments. Intra-tumoral heterogeneity has been reported according to the Bareche classification. Each subtype is associated with different altered molecular pathways and clinical outcomes.
The classification reported by our group defined five subtypes, namely basal like (BL), immunomodulatory (IM), luminal AR (LAR), mesenchymal (M) and mesenchymal stem like (MSL).
Here we aim to morphologically characterize the five molecular subtypes by annotating different histomorphological structures and by studying the distribution of each element using an image processing software.

Materials and methods

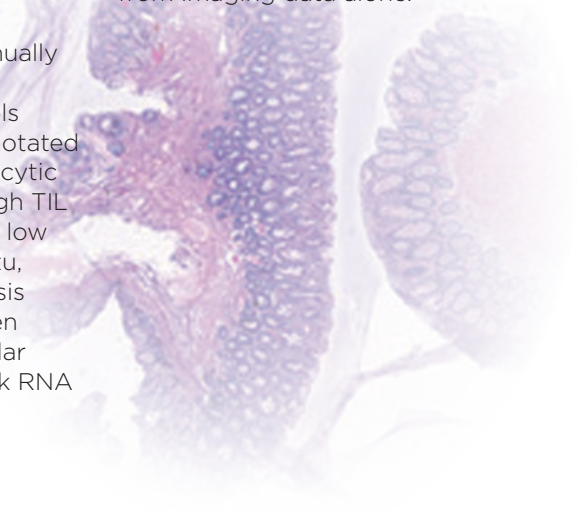
94 frozen breast cancer samples were manually annotated by breast cancer dedicated pathologists using artificial intelligence tools (Qupath). This allowed the slides to be annotated at single cell resolution for tumour, lymphocytic and stromal cells, and at region level for high TIL (Tumour-Infiltrating Lymphocytes) stroma, low TIL stroma, adipose tissue, carcinoma in situ, lactiferous ducts, lymphoid nodules, necrosis and vessels. All these annotations were then quantified in percentage pixels. All molecular subtypes of Bareche were obtained by bulk RNA sequencing.

Results

We found that BL and IM had the most tumour cells, while LAR and MSL had the least, the reverse being true for the stroma. IM had a higher amount of lymphocytes and lymphoid nodules, while LAR had the least. Carcinoma in situ was typical of LAR and MSL tumours. Fatty tissue and vessels were uncommon in BL and IM tumours. Lactiferous ducts were typical of MSL tumours. ($p < 0.05$)

Conclusion

Morphological analysis of tumours mapped down to the cellular level by a supervised artificial intelligence software allowed the characterisation of genetic subtypes of TNBC. This suggests the possibility of assessing the molecular subtype from imaging data alone.



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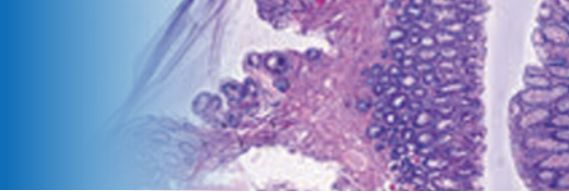

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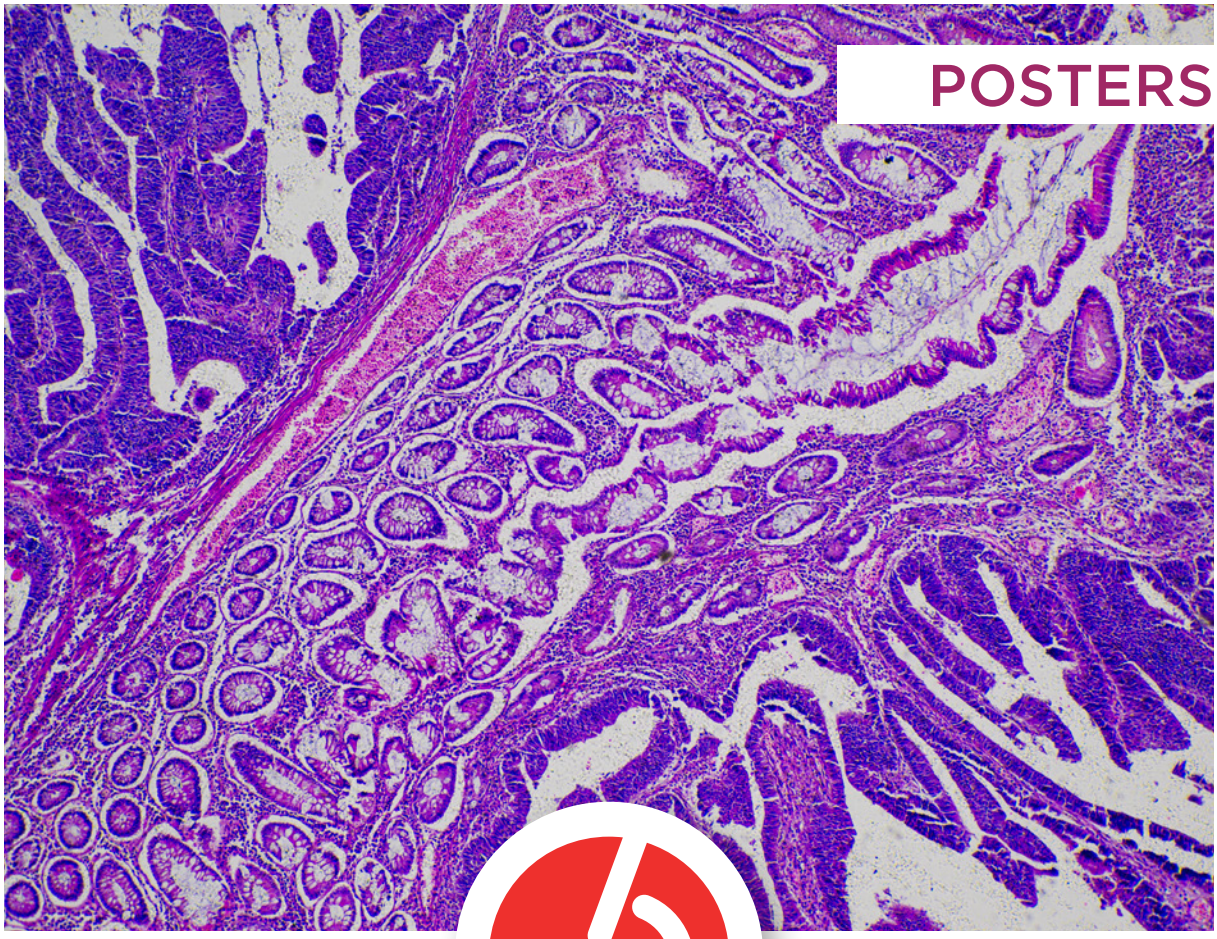

POSTERS

POSTERS

P 01

HISTOLOGICAL GROWTH PATTERNS OF COLORECTAL PERITONEAL METASTASES AND THEIR PROGNOSTIC IMPACT

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Abstract

Objective

Histological growth patterns (HGP) of colorectal hepatic metastases (HM) have been reported as a major prognostic factor. HGP evaluation of colorectal peritoneal metastases (PM) has never been performed before. In this study, we aimed to evaluate the existence of different HGP in colorectal PM, and whether they reflect a prognostic impact in terms of disease-free survival (DFS) and overall survival (OS).

Methods

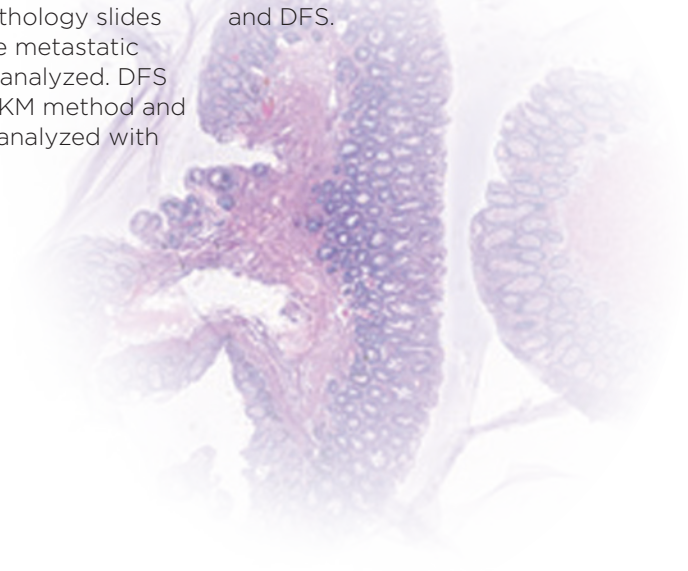
This is a retrospective study including all patients operated for PM of colorectal origin between July 2012 and March 2019 with a PCI ≤ 6. Two of the largest, completely excised nodules, were chosen for each patient, and all of the pathology slides showing the margins between the metastatic nodule and the peritoneum were analyzed. DFS and OS were calculated with the KM method and difference between groups were analyzed with the log Rank test.

Results

In this cohort, 50 patients met the inclusion criteria and histological slides from 38 patients were available for analysis. We identified a dominant "pushing" type (≥ 60%) in 16 patients (42%), and a dominant "infiltrating" type in 22 patients (58%). No desmoplastic HGP was found. Patients with a dominant pushing HGP had a significantly better prognosis than those with an infiltrating HGP with a DFS of, respectively, 73.2 and 19.5 months (p=0.043) and an OS of 102.6 and 51.3 months (p=0.044).

Conclusion

For the first time, we report the determination of a reproducible HGP for colorectal PM, and observe a significantly more favorable prognosis for the "pushing" type (≥ 60%), in terms of OS and DFS.



P 02

MULTI-FOCAL GENOMIC DISSECTION OF SYNCHRONOUS PRIMARY AND METASTATIC TISSUE FROM DENOVO METASTATIC PROSTATE CANCER.

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Background and objective

De novo metastatic castration-sensitive prostate cancer (mCSPC) is highly aggressive, but the lack of routine tumour tissue in this setting hinders genomic stratification and jeopardizes precision oncology efforts. Cancer genotyping can identify vulnerabilities exploitable by targeted therapies, and promises to help prognosticate. Currently, it is unclear the extent that intra-patient heterogeneity impacts clinical cancer genotyping.

Materials and methods

We performed genomic profiling of 607 synchronous primary foci, metastatic lesions, and cell-free DNA from 43 de novo mCSPC patients who underwent prostatectomy at diagnosis. Surgery is not currently standard practice in this disease setting. All samples were subjected to targeted DNA sequencing using a bespoke prostate cancer-specific panel and/or whole-exome sequencing.

Results

Sequencing-derived tissue tumour fraction was heterogeneous and low across same-patient foci in ~20% of patients. In samples with high tumour fraction, the genomic landscape of mCSPC closely resembled metastatic treatment-resistant prostate cancer. In same-patient samples, intra-prostate heterogeneity in mutation, copy number, and whole-genome duplication status was pervasive. Phylogenetic modelling demonstrated additional complexity in several patients driven by polyclonal metastatic seeding from the reservoir of primary populations. While the metastatic clones were often identified in the primary site, frequent discordance between select primary foci and synchronous metastases in clinically-relevant genes, plus highly variable per-sample tumour fraction, resulted in false genotyping of the dominant disease, when relying on a single tissue focus. However, in silico modelling demonstrated that analysis of multiple prostate diagnostic biopsy cores can rescue misassigned somatic genotypes.

Conclusions

Our work reveals extensive polyclonality that undermines standard precision genotyping in de novo mCSPC, nominates practical strategies for improved biomarker profiling and genomics-informed risk stratification, and offers deep biological insight into the relationship between primary and untreated metastases.

P 03

A TISSUE MICROARRAY (TMA) MODEL FOR THE STUDY OF MOLAR PREGNANCIES

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Background

Molar pregnancies, or hydatidiform moles(HM), are either partial(PHM) or complete (CHM). Despite the well described histopathological criteria, some of these lesions remains to be challenging in arriving a precise diagnosis. Moreover, there are no strict histopathological or immunohistochemical(IHC) features those could predict persistence or progression of benign HM to gestational trophoblastic tumours(GTT).
Objectives:
To construct a Tissue MicroArray(TMA) model for the histopathological studies of molar pregnancies. Testing Bcl-2 by immunohistochemistry will be also performed.

Methods

TMAs were constructed (2cores/case, each of 3mm diameter) using archival material of 237 HMs (95 PHM and 142 CHM) and 202 control trophoblastic tissues "products of conception(POC) and normal placentas". Sections were stained with H&E and antibodies against Bcl-2.

Results

The two TMA cores were retained in all the slides in 91.6% of the cases, while 4.6% of cases were presented by one core only. Both cores were lost in 3.8 % of cases. In about 76% of cases with retained core(s), more than half of the areas of the cores were occupied by the target tissues (chorionic villi with the villous cytotrophoblasts, syncytiotrophoblasts and stromal cells) with or without extra/non-villous intermediate trophoblasts, while less than half of the area of the core showed the target tissues in 19% of the cases. Only 5% of cores showed a complete absence of the target tissue components.
In 49.8% of cases with retained core(s) and represented target tissues, both the chorionic villi and non-villous trophoblasts were present in the same TMA spot, whereas 48.6% of cores showed only chorionic villi, 1.6% of the cores showed only extravillous trophoblasts. Bcl-2 was expressed in all trophoblasts (>95%) in PHM, CHM and controls. Bcl2 staining showed a reduction in its intensity from normal trophoblastic cells to PHM and to CHM.

Conclusions

Construction of TMA with two cores, each of 3mm diameter, can overcome tissue heterogeneity of complex lesion. Decreased BCL-2 expression in CHM compared to PHM and normal trophoblastic tissues indicates increased cell apoptosis and, consequently, uncontrolled trophoblastic proliferation.

Keywords: Hydatidiform mole, Tissue microarray, PHM, CHM, POC, IHC

P 04

RELATION OF PDL1 EXPRESSION WITH MICROSATELLITE INSTABILITY AND P53 STATUS IN ENDOMETRIAL CARCINOMA

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Background

Endometrial carcinoma (EC) is the most common gynecological cancer worldwide. The cancer atlas genome (TCGA) molecular grouping of a given case of EC could be assessed by the status of POLE gene mutation, mismatch repair (MMR) "to reflect the microsatellite instability (MSI)» and p53 gene, which has proved to be of prognostic value. Programmed cell death receptor 1 (PD-1) and its ligand (PD-L1) are playing a progressively important role in tumor immunology and in cancer treatment.

Objectives

The aim of this study is to investigate PD-L1 immunohistochemical (IHC) expression in EC in relation to MMR and p53 status. Relation of the expression of the markers with the different histopathological parameters will be investigated.
Methods:
This is a retrospective study performed on archival biopsies of 170 EC cases using a model of Tissue Microarrays (TMA). Immunohistochemical staining was applied using antibodies against PD-L1, MLH1, MSH2 and p53.

Results

The percentages of positivity among the studied markers was as follows; PD-L1 (19.6%), HLH1 (79.5%), MSH2 (78.5%) and p53 mutant (13.8%). There was a statistically significant correlation between the expression of MLH1 and MSH2 (p=0.008). The grade of the tumour was significantly correlated with stage (p=0.005) and p53 mutant pattern of expression (p=0.008). Combined PD-L1 positivity and MMR deficiency showed significant correlation with the presence of lymphovascular space invasion (LVSI) (p=0.014). MSH2 negativity was associated significantly with poorer overall survival (p=0.014).

Conclusions

A panel of immunohistochemical markers (PD-L1, MLH1, MSH2 and p53) could help predicting the prognosis and planning the treatment of EC patients. MMR deficiency seems to be a good predictor for the PD-L1 status, and therefore, the response to a potential PD-1/PD-L1 inhibitor therapy.

Keywords: Endometrial carcinoma, immunotherapy, prognostic markers, PD-L1, MMR, p53

P05

WHAT SHOULD WE CALL AN ADVENTUROUS MENINGIOMA? AN ECTOPIC MENINGIOMA: A CASE REPORT WITH A LITERATURE REVIEW

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Abstract

Background

Ectopic (extradural) meningiomas have a prevalence of 2%, among which middle ear meningiomas are <1%. In the middle ear they account for 2% of all benign and malignant processes. There are several theories on their origin, but two are more advanced. The first theory is that they arise from pluripotent mesenchymal cells that undergo differential maturation. On the other hand, they may arise from 'pushed off' embryonic arachnoid cells located outside the skull and vertebra along the primitive nerve or bone sheaths.

Case

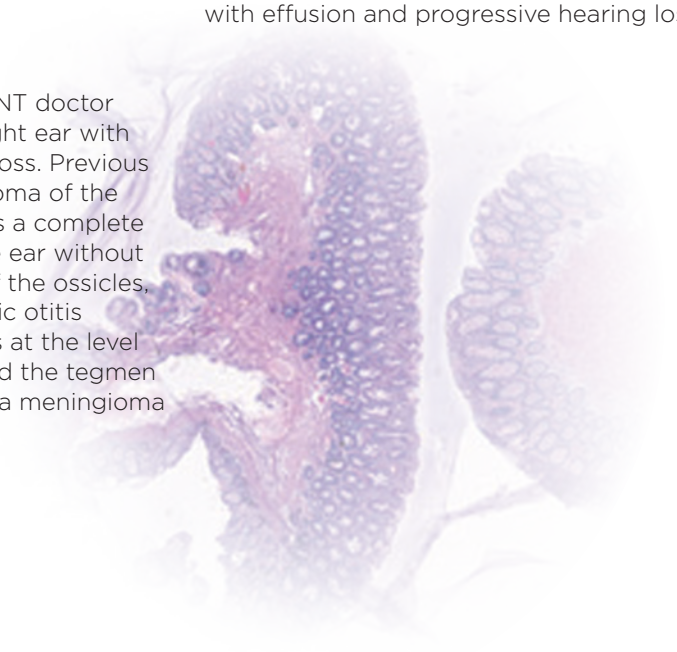
62 year old woman presents to a ENT doctor because of pulsatile sensation in right ear with recurrent otitis media and hearing loss. Previous medical history includes a meningioma of the middle cranial fossa. Imaging shows a complete soft tissue filling of the right middle ear without erosive abnormalities at the level of the ossicles, presumably in the context of chronic otitis media. Also, a reactive hyperostosis at the level of the squamous temporal bone and the tegmen tympani on the right, suspected of a meningioma en plaque.

Diagnostic work up

Biopsy of the middle ear lesion was taken during surgery (attico-antro-mastoidectomy). The HE slide showed fragments of fibro vascular connective tissue mixed with histiocytes, adipose material and calcifications. There are a few bundles of small monotonic cells without atypia. Immunohistochemistry showed negative staining for S100 and CD56, but positive staining for EMA, ker32β12 and PR. Ki67 showed low proliferation.

Conclusion

Ectopic meningiomas of the middle ear is very uncommon but have to be taken in to count in middle aged patients with recurrent otitis media with effusion and progressive hearing loss.



P 06

HIGH-GRADE ENDOMETRIAL STROMAL SARCOMA-LIKE' SARCOMA IN MALE: DOES IT EXIST? A CASE REPORT AND REVIEW OF THE LITERATURE

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Abstract

Background and objective

Exceptional case of an undifferentiated round and spindle cell sarcoma, occurring in the periprostatic region in a 54-year-old male, with a 'high-grade endometrial stromal sarcoma-like' (HG-ESS) morphology and harboring a ZC3H7B::BCOR gene fusion. Could we consider this case as a 'high-grade ESS-like' sarcoma occurring in a man?

Materials and methods

Immunohistochemistry was performed on the case and showed a strong, patchy expression for pancytokeratin AE1/AE3 and a diffuse cytoplasmatic positivity for CD99. There was a loss of expression for H3K27me3 and H3K27me2. There was no positivity for BCOR on immunohistochemistry.
RNA sequencing was carried out and revealed an in-frame fusion transcript between exon 10 of the ZC3H7B gene and exon 7 of the BCOR gene. Next, copy number variation (CNV) showed a complex molecular karyotype, including a deletion for the CDKN2A/B gene.
Further, we compared our case with previous cases described in the literature.

Results

Our case showed striking morphological, immunohistochemical and molecular overlap with ZC3H7B::BCOR fusion positive HG-ESS, a distinct subset in the group of ESS.

Conclusion

Based on the striking histological and immunohistochemical similarities between ZC3H7B::BCOR fusion positive HG-ESS and the extremely rare described cases of extra-uterine undifferentiated sarcomas with a ZC3H7B::BCOR fusion (including current case), we could suggest that the morphology seen in these cases could be characteristic for high-grade sarcomas with ZC3H7B::BCOR fusion, independent of the primary site, and one could emphasize that our current case could represent an extremely rare example of a 'high-grade ESS-like' sarcoma occurring in a man.

P07
A CASE TO REMEMBER: MALAKOPLAKIA MIMICKING LOCALLY ADVANCED RENAL CARCINOMA

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Background and objective

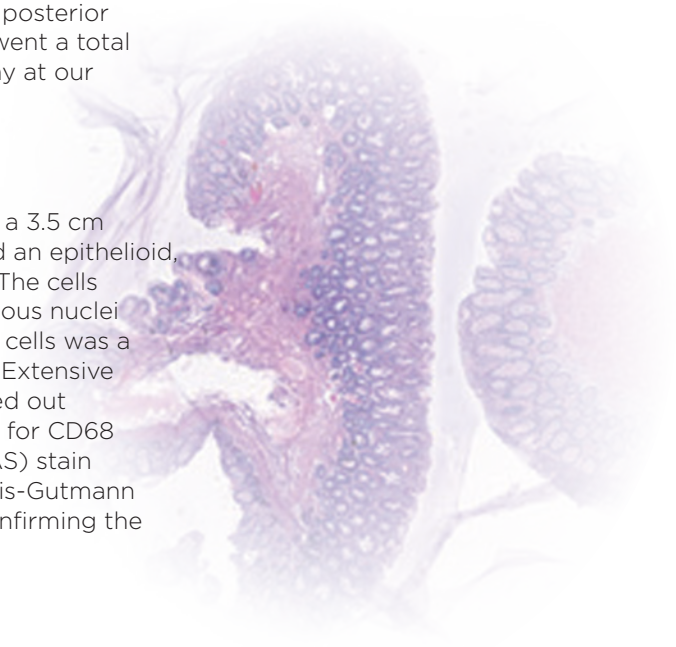
Malakoplakia is a rare inflammatory process seen in immunocompromised patients that may mimic malignancy. It is caused by deficient phagocytic action of histiocytes in response to bacteria. Although malakoplakia can occur - throughout the body, it is most commonly seen in the gastro-intestinal and urogenital tract.

Materials and methods

Our case is an 78-year-old man with a history of type II diabetes mellitus, presenting with a renal mass that had progressed despite radiofrequency ablation. The renal mass had been incidentally detected two years prior, after an extensive bowel infection presumably secondarily to cholecystitis. Radiological imaging prior to surgery showed tumor expansion with colonic and posterior wall adhesions. The patient underwent a total nephrectomy and partial colectomy at our institution.

Results

Pathological examination revealed a 3.5 cm nodular lesion. Microscopy showed an epithelioid, oncocytic-like multinodular mass. The cells were monotonous with inconspicuous nuclei and a low mitotic rate. In-between cells was a mild lymphoplasmocytic infiltrate. Extensive immunohistochemical analysis ruled out malignancy, and showed positivity for CD68 in all cells. Periodic acid–Schiff (PAS) stain displayed pathognomonic Michaelis-Gutmann cytoplasmatic inclusion bodies, confirming the diagnosis of malakoplakia.



Conclusions

Malakoplakia is a rare condition. Despite its distinctive morphological features, it may mimic malignancy both clinically, radiologically, and histopathologically. Awareness of this disease is important as therapeutic consequences are totally different.

P 08

HIGH-GRADE ENDOMETRIAL STROMAL SARCOMA-LIKE' SARCOMA IN MALE: DOES IT EXIST? A CASE REPORT AND REVIEW OF THE LITERATURE

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Background and objective

ACVR1 (encoding for ALK2) mutations are nearly exclusively described in diffuse intra pontine gliomas (DIPG) in pediatric population, mostly co-occurring with H3 mutations. Very few data are available about the presence of these mutations in non-midline gliomas while promising effects have been published for ALK-2 inhibitors. The objective here is to provide a review of literature and to report a case of an ACVR1-mutated non-midline glioma.

Material and Method

We report the case of a patient who presented a rapidly evolutive diffuse glioma. Molecular analyses were performed by Next Generation Sequencing (NGS). A literature review regarding ACVR1 mutations in non-midline gliomas was conducted.

Results

We report a case of a 75-year-old woman who underwent brain magnetic resonance imaging (MRI) because of de novo tonico-clonic seizures associated with right hemiparesia, hemianopsia and aphasia developed since February 2022. Magnetic Resonance Imaging (MRI) showed a gliomatosis cerebri pattern of infiltration including the left temporal lobe, frontal lobe, internal capsule with an extension to the right hemisphere by the corpus callosum. A follow-up was proposed. In April 2022, regarding the evolution of the lesions and the newly developed hypermetabolism showed by the Methionine-PET, a biopsy was performed. Microscopic examination revealed an infiltrating gliomas with moderate nuclear atypia and brisk mitotic activity without necrosis. NGS testing revealed TP53, TERT promoter mutations and ACVR1 G328E mutation. No mutations were detected in IDH, H3F3A or HIST1H3B/C genes. The literature review highlighted that ACVR1 mutations were nearly restricted to pediatric DIPG with only one adult gliosarcoma (no data about location) reported with ACVR1 G328E mutation.

Conclusions

The effect of ACVR1 mutations on the prognosis of adults with non-midline gliomas is unknown. Further molecular investigation about these mutations, especially in gliomatosis cerebri pattern of gliomas, could precise the prognosis and the evolution for these patients.

P09

A SERIES OF STROMAL MELANOCYTOSIS OR SO-CALLED 'BLUE NAEVUS' OF THE UTERINE CERVIX

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Background and objective

Foci of melanocytes in the stroma of the uterine cervix are often designated as extra-cutaneous blue naevi. The pathogenesis of blue naevi of the female genital tract is not yet fully understood. They might originate from Schwann cells or perineural cells of peripheral nerve fibres, or they could be derived from abnormally migrated neural-crest derived cells. Although this lesion is considered as a rare incidental finding, a Japanese study reported cervical blue naevi in 8,6% of hysterectomy specimens, with the highest prevalence in the fifth decade of life.

Materials and methods

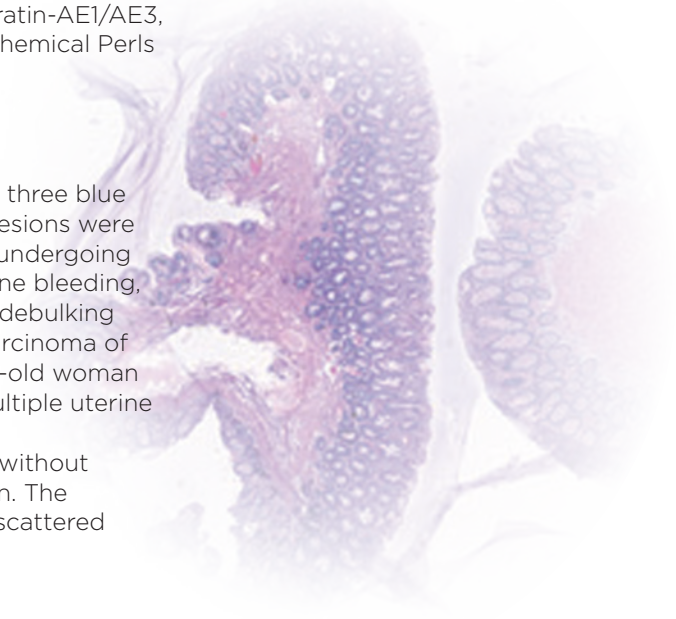
Standard haematoxylin/eosin-stained slides were evaluated. Immunohistochemical stains were performed, including SOX10, S100, HMB45, MART1 (melan-A), cytokeratin-AE1/AE3, neurofilament, and CD68. A histochemical Perls stain for iron was also performed.

Results

Here, we describe a small series of three blue naevi of the uterine cervix. These lesions were detected in a 38-year-old woman undergoing a hysterectomy for abnormal uterine bleeding, a 70-year-old woman undergoing debulking surgery for a high-grade serous carcinoma of tubo-ovarian origin, and a 50-year-old woman undergoing a hysterectomy for multiple uterine leiomyomas.
All cases were incidental findings, without obvious macroscopic pigmentation. The microscopic examination showed scattered brownish pigmented cells in the superficial stroma of the endocervix, without obvious melanocytic cells in the overlying endocervical mucinous epithelium. Mitoses were absent. These pigmented cells were negative for CD68, CK-AE1/AE3 and neurofilament, and showed diffuse and strong immunoreactivity for HMB45 and MART1. Immunoreactivity for SOX10 and S100 was less pronounced, but yet clearly present. The Perls iron stain was negative.

Conclusion

We report here a series of three cases of foci of stromal melanocytosis, or so-called blue naevus, of the uterine cervix. All cases were incidental findings without macroscopically visible pigmentation. None of these lesions was associated with the presence of melanocytes in the overlying endocervical mucinous epithelium.



P 10

NIPPLE ADENOMA, RADIAL SCAR AND VASCULAR MALFORMATIONS IN A PATIENT WITH KLIPPEL-TRÉNAUNAY SYNDROME

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Background and objective

Klippel-Trénaunay syndrome is a progressive congenital disorder, characterized by malformations of blood and lymph vessels and hypertrophy of bone and/or soft tissues. Here, we discuss a 40-year-old woman with Klippel-Trénaunay syndrome, who presented with a retracted nipple. She had a history of unilateral nipple discharge of the left breast since four years.

Materials and methods

Medical imaging by mammography, ultrasonography and MRI were performed. The patient underwent a biopsy, followed by surgical excision of the nipple and the underlying lesion. The histopathological examination comprised haematoxylin/eosin-stained tissue sections, as well as immunohistochemistry for p40, smooth-muscle myosin heavy chain (SMM-HC), cytokeratin-5, oestrogen receptor, podoplanin, ERG, and PROX1.

Results

Clinically, there was a hard retro-areolar mass of around 3 cm. Medical imaging revealed a 9 mm nodule immediately adjacent to the nipple, with a deeper located, suspicious retro-areolar mass measuring 16 mm. The biopsy of this suspicious distorting nodule showed a complex sclerosing lesion (radial scar) associated with usual duct hyperplasia (UDH) and sclerosing adenosis. The lumpectomy specimen confirmed this diagnosis, but also showed a nipple adenoma and diffuse venous and lymphatic malformations. A traumatic neuroma was identified near the biopsy site.

Conclusion

When a patient presents with unilateral nipple discharge and a retracted nipple, a malignant neoplasm should be excluded. However, not all distorted nipples are caused by an underlying cancer, as is proven by the present patient. Despite the suspicious medical imaging, the underlying cause was a combination of benign, yet severely disfiguring lesions, comprising a nipple adenoma and radial scar, surrounded by extensive lympho-vascular malformations, related to the Klippel-Trénaunay syndrome.

P11

PIGMENTED EPITHELIOID MELANOCYTOMA: A RARE SKIN LESION: REPORT OF A NEW CASE WITH TERMINOLOGY AND PROGNOSTIC DISCUSSION

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Background

Pigmented epithelioid melanocytoma is a rare skin lesion, described first as a melanoma in animals. Several cases are described in literature and confused debates about it's outcome are raised. We report here a new case.

Case report

A 29-year-old man, with history of neoplasia in his relatives, consulted for a left foot dorsum discovered 2 months ago and significantly growing in size, according to him. He is a of phototype 4 and the lesion is like to be put on the skin, nodular, sessile with large base, tender and blue to black in colour and measuring 1 cm in maximum dimension. The lesion was excised. The gross section showed a blackish homogenous cut surface. Histologically, the lesion is respecting the epidermis, with grenz zone kept and composed by nests of epithelioid cells with eosinophilic or amphophilic cytoplasm sometimes obscured by dense melanin pigment and showing a scanty, non-atypical nuclei with small nucleoli. These cells expressed S100, NSE and HMB45 but negative for Cytokeratin (AE1/AE3) and CD68, which is expressed by melanophages in the stroma. The diagnosis of pigmented epithelioid melanocytoma is proposed.

Conclusion

We report here this case for his rare presentation and diagnostic dilemma, since the tumor is rare un human and mostly described in animals as melanoma or sometimes confused with epithelioid blue nevus arising in Carney complex. The prognosis of this tumor is unclear by there the management. Should be considered as melanoma of low potential of malignancy of benign tumor than some ancillary tests used for melanoma could be involved or not? The debate is always continued.

P 12

RARE CEREBELLAR ABSCESS: REPORT OF CASE CAUSED BY FUNGAL FONSECAEA SPECIES. (DERMATIACEOUS MOULD)

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2 Section of microbiology, Section of Anatomic Pathology. Department of pathology and laboratory medicine.

Background

Cerebral abscess can be caused by bacteria, fungi, or parasite infecting a part of the brain. Among the many fungal, genera Fonsecaea species is rarely the culprit pathogen. We report here new causing difficulties for the histopathologist. The role of parasitologist is crucial in such cases,

Case report

66-year-old female, diabetic and hypertensive with rheumatoid arthritis and kidney transplanted in 2019 and treated by immunosuppressors. She was admitted in surgery department for headache, dizziness and diplopia with adiadokosinesia at the physical examination. A CT scan showed an ill-defined lesion, heterogenous and located in the right cerebellar hemisphere exerting minor effect on related four ventricle. Craniotomy with evacuation of the lesion was done. Histologically the lesion consists on an active abscess developed in the white matter with necrotic center showing spores and hyphae's highlighted by PAS and Grocott staining, confirming the fungal infection. According to the morphology of these fungi, we suggested aspergillosis, one month later, the lesion recurred and re-evacuation was done, simultaneously the fungal culture was proceeded and showed a Dematiaceous mould specified by the parasitologist as Fonsecasea species, type conidiophores. The patient was treated accordingly but she died after one week.

Conclusion

Dematiaceous fungal brain abscesses are a rare cause of CNS infections. Early diagnosis with tissue biopsy is essential for timely access to appropriate antifungal therapy. Complete surgical resection is associated with improved outcomes.

P13

MONOMORPHIC EPITHELIOTROPIC INTESTINAL T-CELL LYMPHOMA: REPORT OF A CASE ARISING IN THE STOMACH

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Background

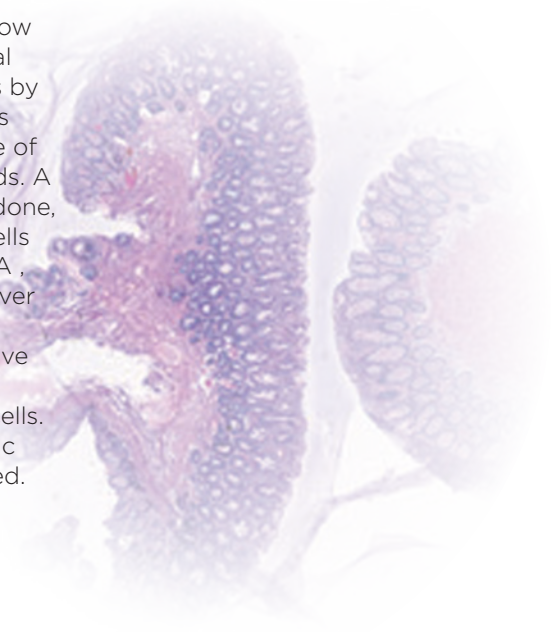
Monomorphic Epitheliotropic Intestinal T-cell Lymphoma (MEITL) is defined as separate primary intestinal T cell lymphoma derived from intraepithelial lymphocytes. It is predominantly located in the small intestine (mostly jejunum, rare cases have been described involving or primarily developed in the stomach. We report here a new case primarily arising in the stomach

Case report

86-year-old, man, followed for Diabetes, High blood pressure and stroke, is admitted for hematemesis of moderate intensity. esophagogastroduodenoscopy done showed multiple shallow ulcers in the gastric body the small intestine was intact. Biopsies from the gastric mucosa and the ulcers are taken. Histologically, the oxyntic mucosa does'nt show any ulcerations but a prominent intraepithelial involvement of the oxyntic glands and crypts by a small or medium sized homomorphous cells with multiple figures of mitoses and presence of clusters of the similar cells between the glands. A panel of immunohistochemical staining was done, excluded the possibility of neuroendocrine cells (pan cytokeratin (AE1/AE3), chromogranin A , synaptophysin and CD56 are negative) however T cell markers are positive (CD3, CD7, CD43, Granzyme B , TIA-1) C. myc is diffusely positive in the tumoral nuclei. B cell markers are all negative except in some reactive residual B cells. The diagnosis of Monomorphic Epitheliotropic Intestinal T-cell Lymphoma has been proposed.

Conclusion

Through this rare case we, summarize the clinicopathological, molecular and imaging feature of the entity in order to improve awareness of this disease among pathologists and physicians.



P 14

ISOLATED OLIGOMEGANEPHRONIC HYPOPLASIA OF KIDNEY: A RARE CAUSE OF FETAL ANAMNIOS: A CASE REPORT

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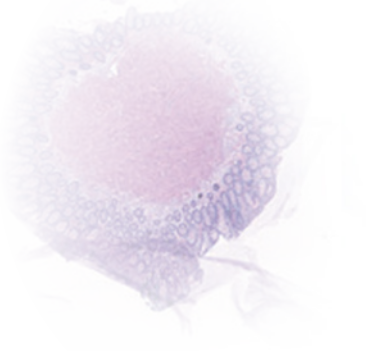
Introduction

Oligomeganephronic hypolasia of the kidney is a rare condition, mostly leading to anamnios in fetuses, characterized by a reduced number of glomeruli with hypertrophy, affecting both kidneys.

Patient and method

We report the first case diagnosed in our department.
It was a 28 week - old- aged female fetus .
The pregnancy was terminated for anamnios and fetal growth retardation, diagnostic by ultrasonography examination.
External fetal examination showed diffuse cutaneous oedema with deformartive sequence.
At the visceral examination, the kidneys were hypoplastic weighting 2gs together.
The histological study compared to a control specimen confirms the hypoplastic feature of the kidneys with reduced number of the nephrons, which were hypertrophic.
These changes support the diagnosis of the oligomeganephronia hypoplasia of the kidney.



Conclusion

oligomeganephronic hypoplasia of the kidney is mostly genetically determined, and associated to many malformative syndromes, however vascular placental anomalies and intra uterine growth retardation could be the causes.

P15

AN INGUINAL NODE METASTASIS OF UNKNOWN PRIMARY SITE : THE CENTRAL ROLE OF THE PATHOLOGIST

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Centre Hospitalier Universitaire de Liège, Belgium.

Background

Extramammary Paget's disease (EMPD) is a rare in situ adenocarcinoma that affects sites with a high density of apocrine glands, such as the anogenital region. Rarely EMPD is associated with an invasive underlying adenocarcinoma such as an adenocarcinoma of the digestive system or genitourinary system. However, this disease can also become infiltrative and metastatic with extension to the lymph nodes.

Case presentation

A 52 year old man presented with a right inguinal adenopathy that had been growing for 8 months. Microscopically, this lymph node is infiltrated by a poorly diferentiated carcinoma positive for cytokeratine 7 and GATA 3. PAS + Amylase show some intracellular mucin vacuoles. After seeking for additionnal clinical information, we are informed that the patient has a non-pigmented lesion of the bursa. The resection specimen shows an intraepidermal carcinoma Cytokeratin 7 and GATA 3 positive and S100 negative corresponding to EMPD.

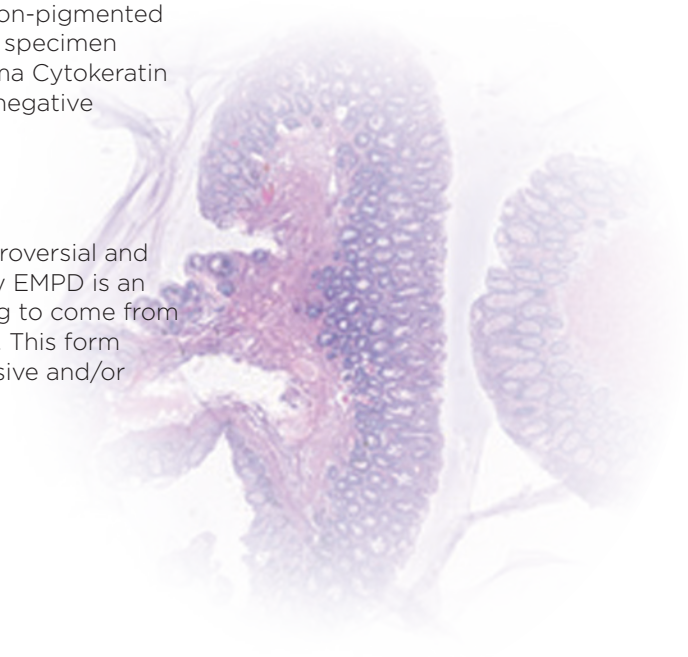
Discussion

The histogenesis of EMPD is controversial and it is generally agreed that primary EMPD is an intraepithelial neoplasia appearing to come from the epidermis or apocrine glands. This form has the potential to become invasive and/or metastatic disease overtime.

In a man with inguinal lymph node metastasis, several primary sites of malignancy are possible and immunohistochemistry can help us determine the primary sites of malignancy.

Conclusions

When faced with a lymph node metastasis of a carcinoma of unknown primary site, it is important to integrate all clinical, morphological and immunohistochemical data in order to determine its origin.
In addition, although rare, EMPD can metastasize and follow-up in these patients is therefore recommended to look for local recurrence, regional lymphadenopathy or distant metastasis.



P 16

ANGIOTENSIN-CONVERTING ENZYME 2 IN MUCOUS MEMBRANE OF SMALL AND LARGE INTESTINES IN PATIENTS IN POST-COVID-19 PERIOD

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2 Public Nonprofit Organization of Kharkiv District Council «Regional Clinical Perinatal Centre», Kharkiv, Ukraine
3 Kharkiv International Medical University, Kharkiv, Ukraine

Background

Angiotensin-converting enzyme 2 (ACE2) plays critical roles in gastrointestinal tract's functioning and COVID-19 development. ACE2 in mucosa of small intestine (SI), large intestine (LI) in patients in post-COVID-19 period is not well-studied yet.

The objective

Is to identify the ACE2 activity and content in mucosa of SI, LI in patients in post-COVID-19.

Materials and methods

The authors used autopsy and biopsy materials. 4 groups (G) were formed. G 1 included the fragments of intact mucosa of SI, LI from 10 deceased without COVID-19 during lifetime. G2, G3, G4 included biopsy material (the fragments of mucosa of SI, LI), respectively, from 11, 13, 12 patients who had mild, moderate, severe COVID-19 in anamnesis. The post-COVID-19 period duration was 50.2±3.42 days. An immunohistochemical study was performed with a monoclonal antibody (MCA) against anti-ACE2. MCA expression analysis was carried out using the brightness factor (BF) in Lab color model.

Results

In G 1-4 the ACE2 expression was detected on the apical surface of mucous membrane epitheliocytes of SI, LI. In G 1 the BF in SI, LI was 0.411±0.008 and 0.500±0.013, respectively. In G 2 compared with G 1, the authors revealed an increase of the ACE2 activity and content, as evidenced by a decrease ($p<0.05$) of the BF (SI – 0.383±0.006, LI – 0.440±0.007). The BF increased ($p<0.05$) in G 3 (SI – 0.517±0.011, LI – 0.583±0.011), G 4 (SI – 0.663±0.010, LI – 0.721±0.010) compared with G 1, indicating a decrease in the ACE2 activity and content in the intestines mucosa.

Conclusions

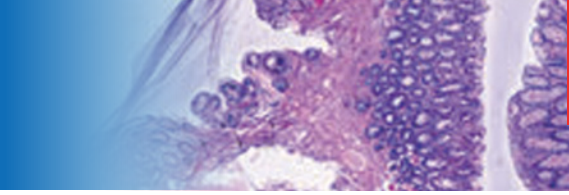
The authors have found a violation of the ACE2 content and activity in epitheliocytes of mucosa of small and large intestines in patients in post-COVID-19 period. There was an increase in the ACE2 content and activity in patients who had mild COVID-19 in anamnesis, a decrease – in patients with moderate, severe COVID-19 in anamnesis.

NOTES

FRIDAY

SATURDAY

NOTES



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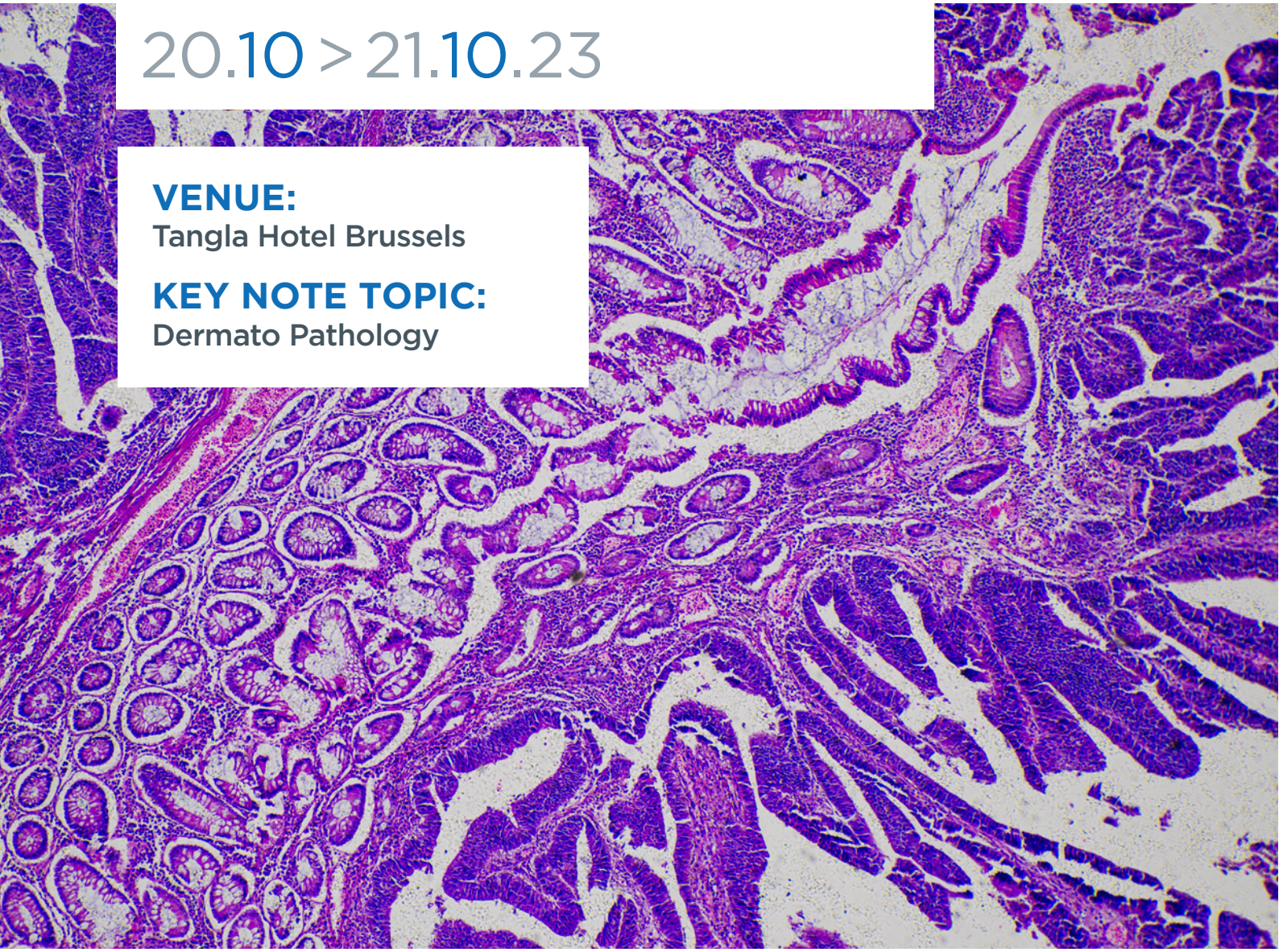

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