

**P R A
G U E
2013**

**6TH CONGRESS
OF THE EUROPEAN FEDERATION
FOR COLPOSCOPY
AND CERVICAL PATHOLOGY**

5–7th September 2013
Prague Congress Centre
Czech Republic

Programme Book of Abstracts



Can you live with a false negative?

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Hybrid Capture® 2 (HC2) HPV test?

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- Over 18 years of clinical data

Learn more! Come and see us at our booth 18 and join our symposium
on Friday, September 6, 2013, 12:45 – 13:45, in the Forum Hall (Lunch Symposium I).

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COMMITTEES

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Kunter Yüce, Turkey

GENERAL INFORMATION

Event

6th Congress of the European Federation for Colposcopy and Cervical Pathology

Venue

Prague Congress Centre (PCC)

Trída 5. května 65
140 21 Prague 4
Czech republic
www.kcp.cz

Organizing Secretariat

GUARANT International/ EFC 2013



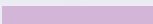


Na Pankráci 17, 140 21 Prague 4
Czech Republic
Tel: +420 284 001 444
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Badges

Participants and Accompanying Persons will receive a name badge upon registration. Everyone is kindly requested to wear his name badge when attending the congress or Get Together Party. Only participants who are wearing their name badge will be admitted to the lecture halls.

Please note: accompanying persons and exhibitors will not be admitted to the scientific sessions.

Name badges have been colour-coded as follows:

	Congress participants
	Faculty
	Accompanying person
	Congress Organizer
	Exhibitor

Car Parking

Parking spaces are available in the underground garages of the Prague Congress Centre. The parking fee is not included in the registration fee.

Free Public Transport in Prague

Public Transport free for all registered participants of the 6th Congress of the European Federation for Colposcopy and Cervical Pathology.

Please pick up your public transportation ticket at the Registration Desk located on the 1st Floor of the Prague Congress Centre. The ticket is valid for the dates of the EFC 2013 Congress.

Currency & Banking

Czech crown (CZK, Kč) is the official currency of the Czech Republic. Exchange of foreign currency is available at Prague international Airport and at most hotels, banks and exchange offices. International credit cards are accepted for payments in hotels, restaurants and shops. Payment in cash in EUR is also available in some restaurants and shops, please ask for details on-site.

Electricity

The Czech Republic uses a 230 volt 50 Hz system, sockets are the standard European type and two-prong round pin plugs, with a hole for a male grounding pin. To use electric appliances from your country you may need a special voltage converter with an adapter plug.

Important Telephone Numbers

150: Fire
155: Ambulance
156: Prague Police
158: Police
112: General Emergency for Europe

Insurance

The organisers do not accept responsibility for individual medical, travel or personal insurance. All participants are strongly advised to take out their own personal insurance before travelling to the Congress.

Internet

Wireless internet connection is not available.

Programme Changes

The organizers cannot assume liability for any changes in the programme due to external or unforeseen circumstances.

Language

The official language of the Meeting is English. Simultaneous translation will not be provided.

Liability

By registering for the Congress, participants agree that neither the Organising Committee nor the Congress Secretariat assume any liability whatsoever. The organizers will not be responsible for the loss or damage of personal belongings.

Main Entrance

Entrance No. 5 of the Prague Congress Centre will be used as the main entrance to access the EFC 2013 Congress site.

Refreshment

Complimentary coffee breaks and lunches will be served to all registered participants.

For information and reservations of restaurants in Prague, please contact the Registration Desk staff.

Taxi Service

In the city centre, taxis can be hailed from the street but we strongly recommend to use hotel taxis or to call taxi by phone through the radio taxi service. Most taxis do not accept credit cards. The official fare is approximately 30 CZK per kilometre so please check the price which should be listed on the car before you get into the car.

AAA taxi: +420 14014
City Taxi: +420 257 257 257
Profi Taxi: +420 844 700 800

Time Zone

The Czech Republic is on Central European Time – Greenwich Mean Time (GMT) plus 1 hour. From April to October is summer time, i.e. GMT + 2 hours.

Tipping

Service is usually included in the bill in bars and restaurants but tips are welcome. If you consider the service good enough to warrant a tip, we suggest about ten percent.

INFORMATION FOR SPEAKERS

- The Speakers should download their presentation at the balcony of the Forum Hall (main congress hall), where the technicians will be available to provide assistance when needed.
- Please bring your presentation on a USB memory stick or CD in MS PowerPoint or Adobe PDF format and submit it **at least 120 minutes prior to your session!** You can of course bring it earlier, in one of the coffee / lunch breaks. In case your talk has been scheduled for the morning session, please come to the technicians one day before the day of your presentation.
- Please be present in the session room 15 minutes prior the start of your session and follow the instructions from the Chairman and/or technician.
- During your lecture a remote control will be available for controlling your presentation.
- At the end of the Congress, all presentations will be deleted from the presentation system and computers on-site.

Opening hours of the Forum Hall:

Thursday, 5 th September 2013	17:00–21:00
Friday, 6 th September 2013	07:30–17:30
Saturday, 7 th September 2013	07:30–16:30

POSTERS

- The poster area is located on the 2nd floor foyer of the Prague Congress Centre. Posters will be organized according to topics and numbers.
- The poster boards will be mounted in vertical orientation, maximum size of the poster is 940 mm width and 1440 mm height.
- There will be no organized or moderated discussions over posters, and it is expected that the authors will be present during the lunch breaks (12:30–14:00 on Friday and 13:00–14:00 on Saturday) to discuss their posters with interested colleagues. In addition, we advise that they stay in the poster area also during coffee breaks for informal discussion of their work.
- Fixing material (pins and stickers) will be available in the Posters Area.
- Please mount your poster on the assigned poster board (marked by your number which was previously distributed and can be found in the Final Programme) at the assigned time and date.
- Posters must be removed on Saturday at the end of the day by 17:00. Posters that are not dismantled by the stated time will be removed by the staff and discarded.

Set-up: Thursday, 5th September, from 14:00
Dismantling: Saturday, 7th September

REGISTRATION

Opening Hours of the Registration Desk

The Registration Desk will be located on the 1st Floor of the Prague Conference Centre and will be open during the times indicated below:

Thursday, 5 th September 2013	08:00–21:00
Friday, 6 th September 2013	07:30–17:30
Saturday, 7 th September 2013	07:30–16:30

Registration Fees

Participant	400 EUR
Student	250 EUR
Day Ticket	250 EUR
Accompanying person	65 EUR
EFC Colposcopy Course (5 th September – all day)	120 EUR

What is covered by the fee?

EFC 2013 Congress Fee Includes:

- Admission to all scientific sessions
- Admission to Opening Ceremony and Get Together on Thursday, 5th September 2013
- Admission to the Czech National Day on Thursday, 5th September 2013
- Admission to poster exhibition and technical exhibition
- Congress material (delegate bag, final programme etc.)
- Coffee breaks and lunches from Thursday, 5th September to Saturday, 7th September 2013

EFC Colposcopy Course Fee Includes:

- Admission to the EFC Colposcopy Course only

Accompanying Person Fee includes:

- Admission to Opening Ceremony and Get Together on Thursday, 5th September 2013
- Sightseeing tour of Prague (2 hours) on 6th September 2013

SOCIAL PROGRAMME

Get Together Party

Date: Thursday, 5th September

Time: 20:30 – 23:00

Admission: free for all registered participants

The Get Together Party will be held at the Restaurant ZOOM which is located on the 1st Floor of the Prague Congress Centre, the EFC 2013 congress venue.

PROGRAMME

Thursday, 5th September 2013

09.00–16.30 EFC Colposcopic Course **Club E**
Coordinators: Simon Leeson (UK), Radovan Turyna (CZ), Pekka Nieminen (FI), Charles Redman (UK)

Session 1: Image recognition
09.00–09.15 Introduction
09.15–10.00 Lecture 1 – Colposcopic principles: Radovan Turyna (CZ)
10.00–11.00 Interactive session 1

11.00–11.30 Break

Session 2: Colposcopic diagnosis
11.30–12.30 Interactive session 2
12.30–13.00 Lecture 2 – Colposcopic diagnosis: Pekka Nieminen (FI)

13.00–14.00 Lunch

Session 3: Colposcopic management
14.00–14.45 Lecture 3 – Colposcopic management: Simon Leeson (UK)
14.45–16.00 Interactive session 3
16.00–16.30 Close – meeting feedback; certificates

14.00–18.00 Czech and Slovak National Day (CZ + SK) **North Hall**
(organized by Czech and Slovak National Society, scientific programme in national language)

1. V. Dvorak (CZ):
Praktické rady ke zlepšení spolupráce registrujícího gynekologa a pracoviště kolposkopické expertízy
2. J. Ondrus (CZ):
Kolposkopická expertíza – State of the Art 2013 v České republice
3. G. Miniello (IT):
Squamous metaplasia and CIN (lecture will be held in english)
4. J. Jendrusak (SLO):
Kolposkopická diagnostika a management L SIL
5. L. Masak (SLO):
Riešenie HSIL u žien, ktoré ešte plánujú rodiť
6. E. Paraskevaidis (GRE):
Pregnancy outcomes after treatment of CIN (lecture will be held in english)

19.30 – 20.30 Opening Ceremony and Invited Lecture **Forum Hall**
Vladimir Dvorak, K. Ulrich Petry, Christine Bergeron, Silvio Tatti

Bohuslav Svoboda (Mayor of Prague, former Dean a Head of OB/GYN Clinic 3rd Medical School of Charles University Prague, onco-gynaecologist)

20.30 Get Together Party **ZOOM Restaurant**

Friday, 6th September 2013

08.30–10.50 Plenary Session I **Forum Hall**
Chairmen: K. Ulrich Petry (GER), Christine Bergeron (FR)
Topics: Basic Science

08.30–08.55 Silvio Tatti (ARG):
Importance of HPV epidemiology in the prevention of cervical cancer
08.55–09.20 Christine Bergeron (FR):
Molecular markers in the genesis of cervical cancer and its consequences on the new histopathology nomenclature
09.20–09.45 K. Ulrich Petry (GER):
The central role of HPV for colposcopy and the impact of colposcopy on the natural course of cervical HPV infection and CIN
09.45–10.10 Marc Arbyn (BEL):
Which HPV tests can be used? Meta-analyses of performance of different HPV tests in primary screening

10.10–10.50 Free communications – 4 x 10 (7 min + 3 min questions)

10.10–10.20 Maria Kyrgiou (UK):
Outcomes of women with untreated CIN2 lesions: is there a role for HPV-related biomarkers?
10.20–10.40 George Valasoulis (GRE):
Alterations on HPV-related biomarkers after prophylactic HPV vaccination and long term data on the expression of HPV-related biomarkers after treatment of CIN
10.40–10.50 Sigrid Regauer (AUT):
HPV negative cancers in vulvar lichen planus

10.50–11.20 Coffee Break

11.20–12.30 Plenary Session II Forum Hall
Chairmen: Vladimír Dvorak (CZ), Jean Luc Mergui (FR)
Topics: Cervical Cancer Screening Strategies in Europe 2013;
Prevention of HPV Associated Diseases

- 11.20–11.40 L. Dusek, V. Dvorak (CZ):
Cervical Cancer Screening Strategies in Europe 2013, Czech screening Program
- 11.40–11.50 J. Jendrusak (SK):
Slovakia – before starting national cervical cancer screening program
- 11.50–12.00 D. Lyons (UK):
Colposcopy Referrals for Women under 25 years old – A London review of Outcomes and Management
- 12.00–12.20 M. Cruickshank (UK):
Impact of HPV Vaccination on Screening Strategies
- 12.20–12.30 V. Dvorak (CZ):
HPV College – presentation of the project

12.30–14.00 Lunch Break

12.45–13.45 Lunch Symposium I – Sponsored by Qiagen Forum Hall
HPV testing in cervical cancer screening: From research to reality

John Tidy, BSc, MD, FRCOG (UK):
The introduction of HPV testing within a national cervical screening programme

Prof. Dr. med. K. Ulrich Petry (GER):
The long term risk for CIN3+ in HC2 negative women and in HC2 positive women with a colposcopy diagnosis of CIN1 or less. 6 years follow-up from an HPV screening program in Wolfsburg, Germany

14.00–15.30 Plenary Session III Forum Hall
Chairmen: Olaf Reich (AUT), Kunter Yüce (TUR)

- 14.00–14.15 Patrick Walker (UK):
What is an expert Colposcopist?
- 14.15–14.30 Evangelos Paraskevaides (GRE):
Does very colposcopic abnormality need a biopsy?
- 14.30–14.35 Discussion
- 14.35–14.55 Walter Prendiville (IRE) vs. Mario Sideri (IT):
See and treat or not to see and treat?
- 14.55–15.00 Discussion

15.00–15.30 Free Communication 3 x 10 (7 min + 3 min discussion)

- 15.00–15.10 Elisabeth A. Shemer (SWE):
Swede score by gynocular and colposcope: a randomized cross over trial
- 15.10–15.20 Jana Zozdika (LAT):
Changes of cervical precancer disease management practices in Latvia after training in UK
- 15.20–15.30 Esther Moss (UK):
Does ethnicity and country of origin have an impact on stage at diagnosis in cervical cancer

15.30–15.45 Coffee Break

15.45–17.30 Plenary Session IV Forum Hall
Chairmen: Charles Redman (UK), Pekka Nieminen (FI)
Topics: Nomenclature up to date; Quality Assurance in Colposcopy

- 15.45–15.50 Charles Redman (UK):
Introduction
- 15.50–16.00 Jacob Bornstein (ISR):
Nomenclature up to date
- 16.00–16.20 Esther Moss (UK):
Formulation of Colposcopy QA standards
- 16.20–16.40 Phillippa Pearmain (UK):
External QA in colposcopy
- 16.40–16.50 Alexander Luyten (GER):
Prospective evaluation of QA standards
- 16.50–17.00 Questions and Discussion
- 17.00–17.05 Jean-Luc Mergui (FR):
Quality Assurance – French perspective
- 17.05–17.10 Pekka Nieminen (FI):
Quality Assurance – Finnish perspective
- 17.10–17.15 Irina Jermakova (LAT):
Quality Assurance – Latvian perspective
- 17.15–17.20 Arkadiusz Chil (POL):
Quality Assurance – Polish perspective
- 17.20–17.30 Questions and Discussion

16.00–17.30 Workshop

2nd EFC Workshop on Treatment of CIN: how to Determine Obstetrical and Oncological Safety Ranges?
Chairmen: Marc Arbyn (BEL) and Evangelos Paraskevaidis (GRE)

North Hall

Maria Kyrgiou (UK):

Adverse obstetrical effects associated with treatment of cervical precancer: needs for further research.

Marc Arbyn (BEL):

IPD-meta-analysis: dose-effect relation between cone size and risk of preterm delivery.

Bjorn Strander (SWE):

Oncological outcomes after treatment of cervical precancer: data from Sweden.

Bugge Noehr (DEN):

Danish data supporting dose-effect relation between cone size and risk of preterm delivery.

Jean Gondry (FR) & Xavier Carcopino (FR):

COSPCC study: development of a standardised clinical form to collect essential data regarding treatment of CIN.

Evangelos Paraskevaidis (GRE) & Marc Arbyn (BEL):

Conclusions.

Saturday, 7th September 2013

08.00–09.15 General Assembly and Elections

Forum Hall

09.30–11.00 Plenary Session V

Forum Hall

Chairmen: Mario Sideri (IT), Antoni Basta (POL)

Topic: Management of Abnormal Screening Results

09.30–09.50 Philippe De Sutter (BEL):
Colposcopy and CIN treatment in young women under 25 years

09.50–10.05 Wojciech Kolawa (POL):
Management of abnormal Pap smears in pregnancy

10.05–10.20 Marek Pluta (CZ):
Management of high grade cervical glandular disease

10.20–10.30 Discussions

10.30–11.00 Free Communication 3 x 10 (7 min + 3 min discussion)

10.30–10.40 Alejandra Castanon (UK):
Risk of preterm delivery after treatment for cervical intraepithelial neoplasia in England

10.40–10.50 Borek Sehnal (CZ):
The incidence of concurrent cervical-anal HPV infection in CIN 2+ women

10.50–11.00 Grainne Flannelly (IRE):
Quality in Irish colposcopy services: the results of a national quality improvement plan

11.00–11.30 Coffee Break

11.30–13.00 Plenary Session VI

Chairmen: Walter Prendiville (Ireland), W. Poppe (BEL)

Topics: Management of Cervical Lesions; Follow-up; CIN Recurrence

11.30–11.50 Olaf Reich (AUT):
Diagnosis and Treatment of Microinvasive Cancer

11.50–12.10 Jean-Luc Mergui (FR):
The RISC system for reproductive management of CIN

12.10–12.30 Walter Prendiville (IRE):
Management of CIN

12.30–12.50 Xavier Carcopino (FR):
Follow up after Therapy of CIN

12.50–13.00 Discussion

13.00–14.00 Lunch Break

13.00–14.00 Lunch Symposium II – Sponsored by BD Diagnostics Forum Hall
Improvements of patient management in cervical cancer prevention: the opportunity of HPV technology

K. Ulrich Petry (GER):

Impact of efficient HPV based screening on cervical disease burden: will the old paradigms still work in future screening populations?

Mario Sideri (IT):

Treatment follow up after conization: the clinical utility of genotyping for risk stratification and management decisions

14.00–16.00 Plenary Session VII

Chairmen: Carmine Carriero (IT), Montserrat Carrarach (SP), Fausto Boselli (IT)

Topic: Vulvar and Vaginal Disease

14.00–14.20 Jakob Bornstein (ISR):

New terminology of colposcopy of vulva and vagina of the IFCPC 2011

14.20–14.40 Charles Redman (UK):

Correct colposcopic evaluation of the vagina

14.40–15.00 Francesco Sopracordevole (IT):

Vaginal Intraepithelial Neoplasia (VaIN): update on epidemiological and clinical aspects

15.00–15.20 Carmine Carriero (IT):

Classification and clinical evaluation of the vulva lesions and vulvar pain

15.20–15.40 Jacob Bornstein (ISR):

Vulvodynia – a hereditary condition?

15.40–16.00 Monserrat Carrarach (SP), Fausto Boselli (IT):

Discussion

16.00–16.30 Closing Ceremony

Christine Bergeron, Vladimir Dvorak and Kunter Yuce
(President of Turkish Colposcopic Society – Chairman of next EFC Congress in 2016)

LIST OF POSTERS

P 1 UMBILICATION IS A STRONG PREDICTOR OF HIGH-GRADE CERVICAL INTRAEPITHELIAL NEOPLASIA

J. Slama, D. Cibula, K. Adamcova, O. Sosna, P. Freitag (Czech Republic)

P 2 THE RISK FACTORS FOR DEVELOPING ANAL HPV INFECTION IN WOMEN WITH CIN 2+

J. Slama, B. Sehnal, O. Sosna, P. Freitag, D. Cibula (Czech Republic)

P 3 EUROPEAN FEDERATION OF COLPOSCOPY TRAINING CURRICULUM CORE COMPETENCIES: A DELPHI CONSENSUS STUDY

E. Moss, M. Arbyn, E. Dollery, S. Leeson, U. Petry, P. Nieminen, N. Myerson, C. Redman (U.K., Germany, Finland)

P 4 NEUROENDOCRINE CARCINOMA OF THE CERVIX: A REVIEW OF CYTOLOGY AND HPV INFECTION

E. Moss, P. Pearmain, S. Askew, P. Dawson, K. Singh, K.K. Chan, R. Ganesan, L. Hirschowitz (U.K.)

P 5 DIAGNOSTIC VALUE OF TRUSCREEN, CYTOLOGY AND COLPOSCOPY

D. Atanassova, V. Zlatkov, S. Borisov, G. Veleva (Bulgaria)

P 6 TREATMENT OF PAGET'S DISEASE OF THE VULVA WITH IMIQUIMOD: A RETROSPECTIVE, MULTICENTER STUDY

A. Luyten, P. Sörgel, A. Clad, F. Giesekeing, K. Maass-Poppenhusen, R.J. Lellé, P. Harter, N. Buttmann, K.U. Petry (Germany)

P 7 PREVALENCE OF HPV IN GEORGIA

M. Jugeli, Z. Tsitsishvili, B. Tkeshelashvili, N. Adamia, L. Zaqaraia, D. Gogia, N. Chogovadze (Georgia)

P 8 SIX YEARS OF HPV VACCINATION IN CZECH REPUBLIC

T. Fait, D. Indrova (Czech Republic)

P 9 TYPE RELATED PREVALENCE AND PERSISTENCE OF HPV INFECTIONS IN WOMEN BORN IN 1988/89

A. Luyten, T. Iftner, A. Justus, A. Iftner, S. Strehlke, A. Reinecke-Lüthge, E. Grunwald, M. Reinhard, K.U. Petry (Germany)

P 10 TRACHELECTOMY IN HPV RELATED CERVICAL DYSPLASIA

P. Chitulea, G. Paina (Romania)

P 11 OUTCOMES OF A NOVEL METHOD FOR DAY-CASE KNIFE CONE BIOPSY

F. Willmott, H. Gibson, R. Wuntakal, A. Hollingworth (U.K.)

- P 12 THE IMPACT OF THE HPV VACCINATION PROGRAMME ON COLPOSCOPY PRACTICE IN SCOTLAND**
M. Cruickshank, K. Cuschieri, H. Cubie, K. Pollock, K. Kavangah, C. Robertson, L. Smart (U.K.)
- P 13 HPV VACCINATION AND HPV DNA AND MRNA GENOTYPES IN YOUNG WOMEN WITH ABNORMAL CERVICAL CYTOLOGY**
M. Cruickshank, A. Munro, S. Cotton, L. Smart, C. Busby-Earle, C. Moore, H. Cubie, K. Cuschieri (U.K.)
- P 14 FOCALITY AND CENTRICITY: EFFECT ON MANAGEMENT AND RECURRENCE OF VIN – A 10 YEAR REVIEW**
P. Sokhal, L. Ratnasekera, C. Wilhelm-Benartzi, J. Chatterjee, D. Lyons (U.K.)
- P 15 LLETZ IN THE UNIVERSITY HOSPITAL ‘SESTRE MILOSRDNICE’, ZAGREB, CROATIA**
D. Butorac, M. Jukić, K. Kuna, M. Grdić Rajković, G. Mirošević, I. Čelap, T. Kovačević, G. Grubisic (Croatia)
- P 16 COLPOSCOPIC AND CYTOLOGIC FINDINGS OF ISOLATED PEMPHIGUS ON CERVICAL AND VAGINAL MUCOSA**
C. Carriero, V. Lezzi, T. Mancini, T. Capursi (Italy)
- P 17 HPV VACCINATION: A POPULATION BASED ASSESSMENT FOR A BETTER PREVENTION**
M. Fender, E. Delarue, J.J. Baldauf (France)
- P 18 THE ROLE OF mRNA E6/E7 HPV EXPRESSION IN COLPOSCOPY OF CERVICAL INTRAEPITHELIAL NEOPLASIA**
B. Galarowicz, A. Basta, R. Jach (Poland)
- P19 HPV POSITIVE PREGNANT WOMAN – WITH OBSTETRICAL HIGH RISK**
S. Puia, M. Mitran, C. Georgescu, D. Pana, L. Mitran (Romania)
- P20 IMPROVED ACCURACY FOR DETECTION OF HG-CIN USING ELECTRICAL IMPEDANCE SPECTROSCOPY (ZedScan I)**
J. Tidy, B. Brown, J. Healey, M. Martin, S. Daayana, W. Prendiville, H. Kitchener (U.K.)
- P21 EFFECTIVENESS AND SAFETY OF LONG-TERM FOLLOW-UP WITHOUT TREATMENT OF LOW GRADE SIL OF THE CERVIX**
C. Carriero, T. Capursi, T. Mancini, V. Lezzi, G. Cormio (Italy)
- P22 IT AND THE BS CCP – AN EVOLUTION OF THE SOCIETY**
G. Flannelly, D. Lyons (Ireland, UK)

- P 23 VITOM ASSISTED LOOP EXCISION OF OF HIGH-GRADE CERVICAL INTRAEPITHELIAL NEOPLASIA**
G.F. Vercellino, E. Erdemoglu, A.M. Dückelmann, K. Vasiljeva, V. Chiantera, I. Drechsler, J. Richter, A. Schneider, G. Böhmer (Germany, Turkey)
- P 24 CLINICAL RELEVANCE OF OBJECTIFYING COLPOSCOPY: THE PATHOGNOMONIC SIGNS**
G.F. Vercellino, E. Erdemoglu, A.M. Dückelmann, K. Vasiljeva, V. Chiantera, I. Drechsler, G. Cichon, A. Schneider, G. Böhmer (Germany, Turkey)
- P 25 SIGNIFICANCE OF ENDO. CRYPT INVOLVEMENT BY HIGH-GRADE CERVICAL INTRAEPITHELIAL NEOPLASIA AFTER LLE**
O. Abughazza, M. Kodampur, J. Kopeika, G. Mehra, T. Pepera, P. Menon, A. Hay, R. Flora, A. Kubba, D. Lyons (U.K.)
- P 26 CHARACTERISTICS OF PATIENTS WITH RAPID EVOLUTION CERVIX PATHOLOGY**
J. Martinez, M.P. Martínez, B. Azcona, O. Sanz, V. Echavarren, A.C. Cabistany (Spain)
- P 27 EXTRAMAMMARY PAGET’S DISEASE OF THE VULVA (EMPD) – A CASE REPORT**
D. Kolářová, A. Havránková, P. Libalová, E. Kučera, S. Frühaufová, Z. Vernerová (Czech Republic)
- P 28 QUALITY ASSURANCE (QA) IN COLPOSCOPY SERVICE IN LATVIA**
I. Jermakova, C.W.E. Redman, J. Zodzika, D. Rezeberga (Latvia, U.K.)
- P 29 DIAGNOSIS AND MANAGEMENT OF PRE-INVASIVE LESIONS OF THE CERVIX**
D. Grigoras, D. Anastasiu, I. Sas, I. Erdelean, D. Erdelean (Romania)
- P 30 COLPOSCOPY ACCURACY AT ST MARY’S HOSPITAL**
M. Aziz, D. Lyons (U.K.)
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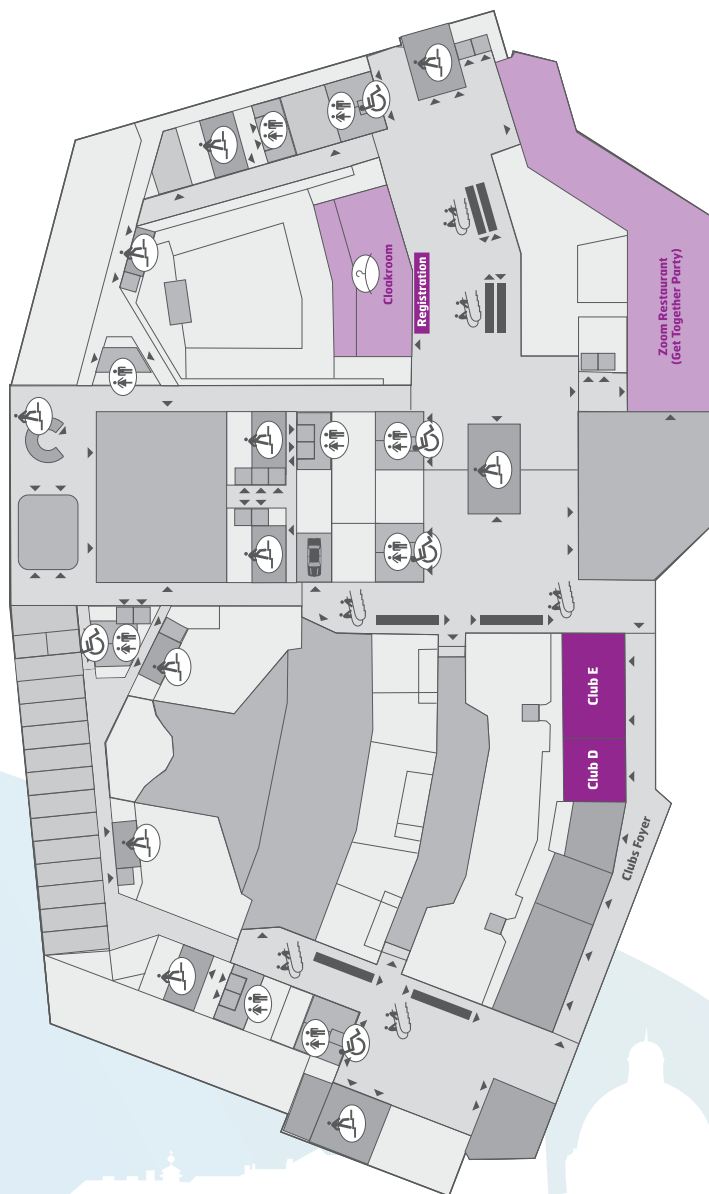
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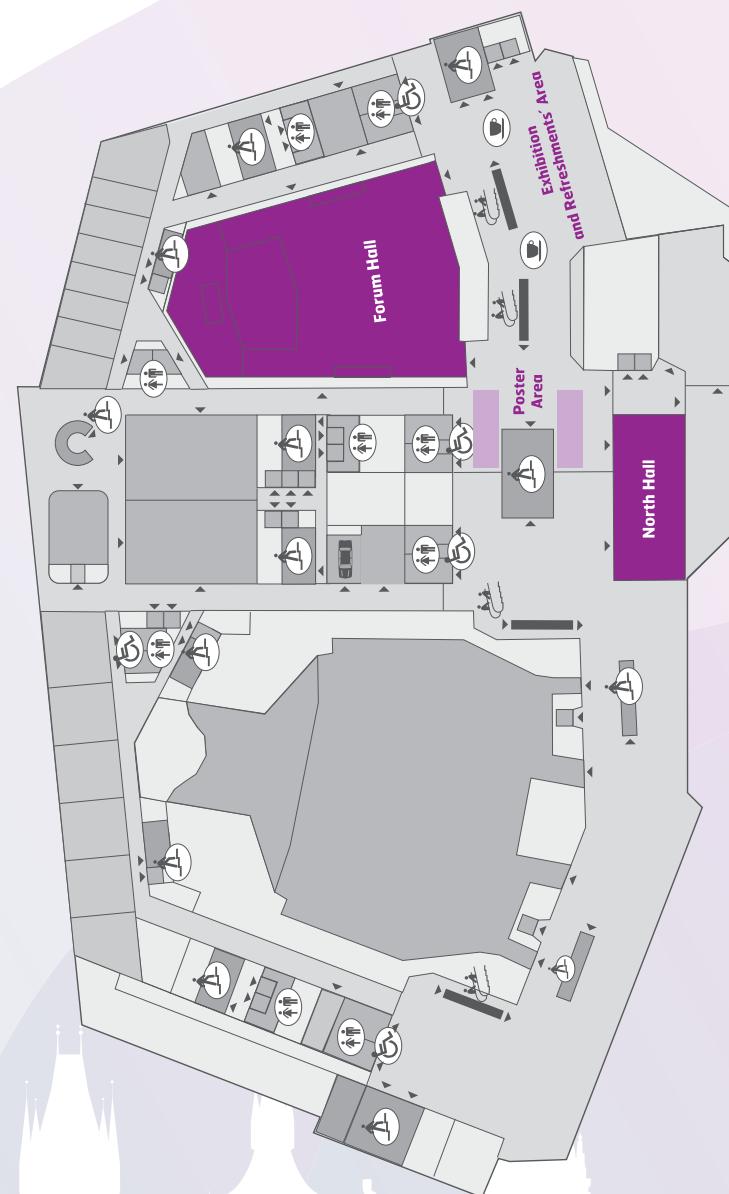
VENUE AND EXHIBITION PLAN, LIST OF EXHIBITORS

The exhibition of pharmaceutical and product companies, medical publishers and scientific societies will be situated in the Forum Hall Foyer on the 2nd Floor of the Prague Congress Centre.

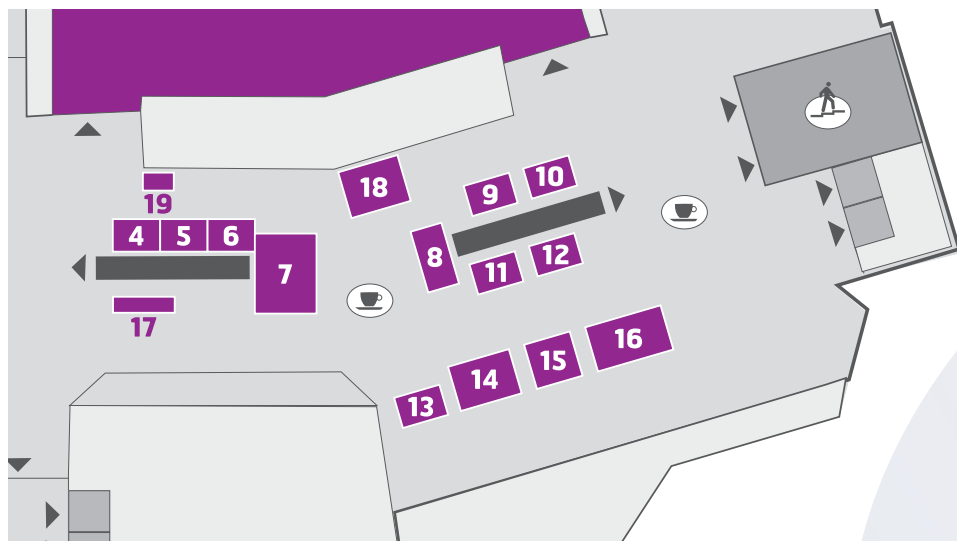
1st Floor



2nd Floor



2nd Floor – Exhibition



Please find below the current list of exhibitors:

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BOOK OF ABSTRACTS – ORAL PRESENTATIONS (FREE COMMUNICATIONS)

PROSPECTIVE MULTICENTRE EVALUATION OF EFC QUALITY INDICATORS

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Objective: The EFC defined quality parameter for examination and treatment of cervical intraepithelial neoplasia in colposcopy clinics. These parameters include the classification of the cervical transformation zone (TZ), number of colposcopic examination prior to treatment for abnormal cervical cytology, percentage of excisional treatments/conizations containing CIN2+ and percentage of excised lesions/conizations with clear margins. Here we report on a prospective electronic quality assessment of the German Colposcopy Network (G-CONE) between different colposcopy clinics to evaluate the utility of EFC quality indicators in daily practice

Methods: From February 2012 to February 2013 eight colposcopy clinics of G-CONE, all certificated by the German Society for Colposcopy, collected colposcopy cases in a central database (“ODScervix”). Benchmarking evaluation was performed according to the EFC quality indicators.

Results: In total 2.651 colposcopic examinations were collected in ODScervix from participating colposcopy clinics. Distribution of TZ was 28% type 1, 54% type 2 and 17% type 3. In 0.35% the visibility of the SCJ / type of TZ was not documented. In case of surgical treatment with LLETZ, laserconization or hysterectomy CIN2+ were found in 88.6% of the specimen. No procedure of cold-knife conization was documented. A pre surgical colposcopy was documented in about 96%. Documentated cases with clear margins ranged from 61 to 83% between different clinics

Conclusion: EFC’s quality parameter were useful in daily practice and “ODScervix” seems to be a practicable tool for documentation and benchmarking in colpo clinics. However, only the quality parameter “>80% CIN2+ in specimen of excisional treatment” was fulfilled by all participating clinics.. The aim of 100% of documented TZ and percentage of colposcopy prior to treatment seems not to be achievable. The relatively low rates of clear margins could be explained either by problems in data entry that could be easily solved by revised version of “ODScervix” or by destructive therapy (e.g. laservaporisation) of ectocervical parts of CIN that was performed by some clinics to avoid cervical mutilation.

OUTCOMES OF WOMEN WITH UNTREATED CIN2 LESIONS: IS THERE A ROLE FOR HPV-RELATED BIOMARKERS?

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Background: A proportion of CIN2 lesions regress spontaneously. Unnecessary treatment may lead to morbidity while expectant management appears to be safe.

Objective: To review outcomes of women with untreated CIN2 lesions and to identify whether HPV-related biomarkers could safely predict the likelihood of regression.

Material & Methods:

Setting: Three University Hospitals; Imperial NHS Trust, London-Ioannina, Greece.

Period: 2009-2011

Population: Young women with histologically proven CIN2 lesions under close surveillance.

Interventions: Follow-up data on cytology, colposcopy and histology were retrieved. In a subgroup with CIN2 (40%), an LBC specimen was prospectively obtained prior to colposcopy and tested for HPV typing, E6 & E7 mRNA by NASBA or flow cytometry, p16INK4a and microspectroscopy.

Outcomes: Progression, persistence, regression rates at 24 months of follow-up. The sensitivity, specificity, PPV and NPV were calculated for combinations of biomarkers. The gold standard was histology.

Results: Out of 102 women, 29% were treated, 18% defaulted at least once, while 71% regressed spontaneously to low-grade or normal findings at 24 months. There were no cases of invasion. Low-grade cytology or colposcopy, young age, small lesions and HPV subtype other than 16 were related to a high likelihood of regression. HPV DNA test achieved high sensitivity, while the combination of NASBA mRNA and p16 optimal specificity; these could be integrated into a clinical algorithm. Results from a larger cohort will be presented.

Conclusion: A substantial proportion of CIN2 lesions in young women spontaneously regress. Some combinations of biomarkers appear to have significant accuracy in identifying misclassified lesions and in predicting lesions likely to regress. This could allow conservative management for women at low risk and avoidance of unnecessary treatment.

PREGNANCY OUTCOMES AFTER LLETZ FOR CIN

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Objective: To determine how the proportion of the cervical volume/length excised affects cervical regeneration and pregnancy outcomes.

Material & Methods: Design: Prospective observational study. Setting: University Hospital of Ioannina (from 1-2009). Population: Women planned to undergo LLETZ for CIN who wish

future fertility. Interventions: The cervical volume&dimensions was calculated with MRI,3D-TVS or 2D-TVS before treatment. The volume&dimensions of the cone was assessed before fixation by a volumetric tube and a ruler; the percentage of excision was computed. Cervical regeneration was estimated by repeat MRI/3D-TVS/2D-TVS at 6months. Outcomes: Cervical regeneration in relation to proportion of excision-Pregnancy outcomes.

Results: A total of 198 women have been recruited (MRI:62, 3D-TVS:101, 2D-TVS:35); 176 completed 6months follow-up. Both the total cervical volume before treatment and the volume of the excised cone varied substantially. The estimated proportion of excision varied significantly between 4.7-41% (median 12.7%). Multivariate linear regression revealed that the proportional deficit at 6 months was determined mainly by the proportion of the excised volume. Subgroup analysis revealed similar findings for each imaging technique. Twenty-three women have conceived following treatment. Nineteen have already delivered, 15 at term, two at 34-36 and 2 at 30-32 weeks of gestation. Both preterm births were observed in women with large proportions of excision. Detailed and updated data on outcomes of the pregnancies will be presented.

Conclusions: Careful assessment of risks and benefits of treatment is essential when deciding to treat women who wish to have future pregnancies. All three imaging modalities appear to be equivalent in cervical volume measurements. Assessment of the cervical volume proportion and length excised might identify those that need further surveillance during future pregnancy.

THE INCIDENCE OF CONCURRENT CERVICAL-ANAL HPV INFECTION IN CIN2+ WOMEN

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Objectives: Human papillomavirus (HPV) infection is highly associated with the development of anal cancer. We demonstrate relationship between anal and cervical HPV infection among women with different grades of cervical intraepithelial neoplasia (CIN) and microinvasive cervical cancer.

Methods: Altogether 272 women 19 - 74 years old were enrolled in the study. The study group included 172 women who had underwent conization for high-grade CIN or microinvasive cervical cancer (CIN 2+). The control group consisted of 100 women with biopsy confirmed CIN 1 or non-neoplastic gynecologic diseases. All participants completed a questionnaire detailing medical history and sexual risk factors and were subjected to the anal and cervical HPV genotyping using Cobas and Linear array HPV test.

Results: Cervical, anal, and concurrent cervical and anal HPV infections were detected in 82.6%, 48.3% and 42.4% women of the study group, and in 28.0%, 16.0% and 8.0% women of the control group, respectively. The incidence of the high-risk (HR) HPV genotypes was significantly higher in the study group and increased with the severity of cervical lesion. Concurrent infections of the cervix and anus occurred 5.3-fold more often in the study group than in the control group with the dominance of genotype HPV 16. The incidence of concurrent infection increased in dependence on the seriousness of the

cervical diagnosis. Any frequency and any type of anal contact were even more significant in subgroup of CIN 2+ patients with concurrent infection with at least one the same HPV genotype. No other evaluated risk factor including anal coitus was statistically significant.

Conclusions: Concurrent anal and cervical HR HPV infection was found in more than a half of women with CIN 2+. The dominant genotype found in both anatomical locations was HPV 16. Any frequency and any type of contact with the anus was showed as the most important risk factor for concurrent HPV infection.

SWEDE SCORE BY GYNOCULAR AND COLPOSCOPE: A RANDOMIZED CROSS-OVER TRIAL

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Background: Screening programs in low resource settings commonly use visual inspection with acetic acid (VIA) for detection of cervical lesions and access to colposcopy is limited. The aim of this study was to explore if a pocket-sized battery driven colposcope, the Gynocular, could provide a reliable screening alternative by using the Swede score method to detect cervical lesions.

Materials and Methods: This study was a randomized, crossover, clinical trial for assessing agreement of diagnosis of cervical lesions by colposcopy using a standard colposcope and a pocket-sized battery-driven colposcope, the Gynocular, in 552 women positive for VIA. All women had a Thinprep test for liquid based cytology and HPV. Swede scores were used at the time of colposcopy and compared with results from liquid based cytology, HPV test and the final histological diagnosis after directed cervical biopsy. To test the level of agreement between the colposcopy and Gynocular, we calculated the percentage agreement and the Kappa statistic. We calculated the detection rates of cervical lesions of the Gynocular and a standard colposcope using biopsy results as criterion standards.

Results: A cross tabulation of swede scores on the colposcope versus gynocular showed perfect agreement in 527 of the 541 measurements (97.4% agreement) with a kappa statistic of 0.96 ($p < 0.0001$). Biopsy identified 94 (17.4%) women with cervical intraepithelial neoplasia 1 (CIN 1) and 28 (5.2%) CIN 2. 5 (0.9%) had CIN 3, and 5 (0.9%) had invasive cervical cancer (CIN 3+). In 84 (15.5%) biopsy showed cervicitis and 2 (0.4%) had cervical tuberculosis on biopsy.

Liquid based cytology detected 15 (3.2%) women with ASCUS, 8 (1.7%) women with CIN 1, 9 (1.9%) women with CIN 2, 2 (0.4%) women with CIN 3 and 2 (0.4%) women with CIN 3. HPV 16 was present in 20 (3.9%) women, HPV 18 was found in 2 (0.4%) women and other high risk HPV (31, 33, 35, 39, 45, 51, 52, 56, 58, 59, 66 and 68) was detected in 22 (4.3%) women. There were no differences between the Gynocular and the standard colposcope in detecting cervical lesions in biopsy. Using cut-off values of 0-4 versus 5 and above for Swede score showed that colposcopy by both colposcope and Gynocular, had a sensitivity of 68.4 and aspecificity of 73.8 for the Gynocular and 74.2 for the colposcope. PPV was 16.5 for the Gynocular and 16.7 for the colposcope. NPV was 96.9 for the Gynocular and 96.9 for the colposcope.

When increasing the cut-off values of 0-7 versus 8 and above for Swede score the sensitivity decreased to 31.6, but the specificity increased to 95.8 in both the Gynocular and the colposcope. This also increased the PPV to 34.4 and NPV to 94.9 in both the Gynocular and the colposcope.

Conclusions: Our study shows that Swede score, using the Gynocular, a hand-held colposcope, is a plausible alternative for cervical screening, as it offers the accuracy of colposcopy with a similar simplicity of conventional VIA or liquid based cytology.

CHANGES OF CERVICAL PRECANCER DISEASE MANAGEMENT PRACTICES IN LATVIA AFTER TRAINING IN UK

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Objectives: To identify changes of cervical precancer disease diagnostic and treatment practices in Latvia after British Society for Colposcopy and Cervical Pathology supported and accredited training in United Kingdom.

Methods: Review and comparison of cervical precancer diseases management before and after training of two doctors from Riga East University hospital, Latvia, in United Kingdom in 2012/2013.

Results: Since 2012 a lot of changes in colposcopy practices have come about in Latvia. There are 35 members in the Latvian Society of Colposcopy, which was established in 2012. In 2012 the first colposcopy center was organized in Riga East University Hospital. Two doctors from that center had an opportunity to train colposcopy in United Kingdom. Since that time cervical biopsies and excisions have been performed under colposcopic guidance, which was not done before in Latvia. Besides a traditionally used excisional technique with a cone electrode, loop excision has been introduced. From January 2012 until May 2013 there were 400 colposcopies and 276 excisions performed in colposcopy clinic of Riga East University Hospital. After an initiative of the Latvian Society of Colposcopy and Latvian Association of Obstetricians and Gynecologists, excision specimen margin status has been described in the histological reports since 2012. In Riga East University Hospital cervical precancer diagnostic and treatment guidelines have been developed, which are planned to be implemented throughout Latvia.

Conclusions: After training in the UK, many marked and important steps towards increasing quality of cervical precancer diagnostics and treatment have been achieved with the aim of decreasing cervical cancer caused morbidity and mortality in Latvia. Nevertheless additional improvements are required. Further distribution of quality assured practices in Latvia is important.

COLPOSCOPY REFERRALS FOR WOMEN UNDER 25 YEARS OLD - A LONDON REVIEW OF OUTCOMES AND MANAGEMENT

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Introduction: Cervical screening in England starts at age 25 years old. Screening has not shown to be effective in reducing the incidence of invasive cancer in women under 25 years. Cervical screening in this age group may lead to increased anxiety, overtreatment and a possible impact on future premature delivery.

Objective: Main aim of the study is to assess referrals to colposcopy clinics in women aged less than 25 years and study the reasons for referral, findings and outcomes. 13 London Units were asked to provide data. These Colposcopy Units were located in all parts of London, with the aim of providing a good sampling of the ethnically and economically diverse London population.

Methods: Data was collected from 13 London hospitals. Cases were identified by databases of individual units. Overall London data was obtained from Quality Assurance reports. An audit proforma was completed for each Unit. Anonymised data was entered onto a spreadsheet, data was collated and analysed.

Results: Referrals in women aged less than or equal to 25 years varied from 0.4% to 8.7% of total referrals to the 13 Units, average was 4.2%. 60% of women were aged between 16-23 years and 40% of women were of age \geq 24 years. One third women smoked in this age group. Two thirds were referred because of abnormal cytology, one third were referred because of urgent/non urgent clinical indications. In the abnormal cytology referral group, 80% were referred with low grade cytology and 20% had high grade referral cytology. Post coital bleeding was the main clinical indication. 70% of referrals for clinical indications had swabs for microbiology tests. 25% of women had high grade abnormality on biopsy and most underwent treatment (121/123 patients). No invasive cancer was found in this age group over this time period.

Conclusions: Referrals to Colposcopy in the age group less than 25 years differ greatly between Units and this may reflect the local population demographic. Over 25% of women had treatment for biopsy proven HG CIN. Overall for these 13 London Units, most (67%) were referred with abnormal cytology and this percentage was similar in those under 24 and those aged from 24-25 years old. We would recommend regular review of under 25's referrals with comparison of data from other Units/ areas, with a view to trend analysis in terms of referral patterns, outcome of referral and future effect on health and obstetric outcomes. It may be prudent to consider a conservative approach to CIN 2 in young women where appropriate.

QUALITY IN IRISH COLPOSCOPY SERVICES - THE RESULTS OF A NATIONAL QUALITY IMPROVEMENT PLAN

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In Ireland, the provision of high quality colposcopy services has been a key priority for the CervicalCheck programme since it commenced in 2008. Fifteen colposcopy services nationwide work with the programme to nationally agreed standards. Each service collects information electronically and a centralised data extraction facilitates calculation of key performance indicators. Here national information is reported for clinical quality indices for the third year of the programme (September 2010 to August 2011) when 17,437 women attended colposcopy for the first time representing sustained growth year on year.

Where an abnormality is suspected at colposcopy it is good practice to perform a biopsy. The target of >95% was achieved in ten services with rates of over 85% in a further three. Two services had relatively low biopsy rates of 59 and 66% respectively.

Treatment was performed under local anaesthetic more than 90% of the time in eleven services with rates of 89% obtained in two. The rates for the two remaining services were 75% and 78%. Treatment at first visit for women with low-grade cytological abnormalities was below the 10% rate in all services. CIN was detected in more than 80% of all excisional treatments in thirteen centres with rates for the remaining two being 77% and 63% respectively. For treatments at the first visit, the detection rate of CIN was in excess of 90% in eleven services with rates of between 85% and 90% in two and rates of 72% and 65% in the remaining two. The positive predictive value for a colposcopic suspicion of high grade CIN exceeded the target of 65% in fourteen centres with a level of 64% in the remaining centre. In thirteen services this figure was in excess of 70%.

We conclude that Irish colposcopy services are making good progress in meeting CervicalCheck clinical targets.

DOES ETHNICITY AND COUNTRY OF ORIGIN HAVE AN IMPACT ON STAGE AT DIAGNOSIS IN CERVICAL CANCER?

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Introduction: The impact of ethnicity on the stage at diagnosis of cervical cancer in the UK is unknown.

Methods: The ethnicity of women diagnosed with cervical cancer in the Pan-Birmingham network between 2005 and 2009 was investigated. Data on country of birth was acquired from Cancer Registry and hospital databases. Countries were categorised into high-, middle- and low-income according the World Bank country classification.

Results: In total 486 cases were identified. A country of birth data was available for 461 (94.9%) cases. Of the women born outside of the UK/Ireland, 40 (59.7%) originated from low-income, 23 (34.3%) from middle-income and 4 (6.0%) from high-income countries. Women from middle-income countries were more likely to have been non-compliant with the screening programme compared to women from high- and low-income countries, 69.6% versus 47.0% and 32.5% respectively. However, women from low-income countries were more likely to be diagnosed with stage 2+ disease compared to high- and middle-

income countries, 62.5% versus 37.4% and 17.4% respectively. On multivariate analysis, age and stage at diagnosis were significantly associated with survival.

Conclusions: Patterns of migration, including country of origin data, need to be considered when planning cervical cancer treatment services. Increased awareness of the National Screening Programme amongst women recently moved to the UK may enable detection of cervical lesions at the pre-invasive stage, potentially reducing the number of cervical cancer cases diagnosed in this population.

RISK OF PRETERM DELIVERY AFTER TREATMENT FOR CERVICAL INTRAEPITHELIAL NEOPLASIA IN ENGLAND

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We aim to estimate the association between treatment for cervical intraepithelial neoplasia (CIN) and the risk of preterm birth in England; specifically whether the depth of excision modifies the risk.

We carried out a cohort study (phase 1) with a nested case-control study (phase 2) using record linkage. We identified women with a histological sample taken at colposcopy between 1989 and 2011 who were then linked by HES (Hospital Episode Statistics) to hospital obstetric records to identify live births. The risk of preterm birth following excisional treatment for CIN was calculated. Using phase 2 data we consider the depth of excision and calculate absolute risks. Analyses were appropriately adjusted for known confounders.

Phase 1 included 18,441 singleton births, with a preterm birth rate of 8.8% compared to 6.7% for England. Phase 2 included 397 births before histology and 1609 after, with about half preterm (by design). Of those with a birth after histology 1027 (64%) had a single treatment and 486 (30%) had a punch biopsy only. Compared to those with a punch, there was no excess risk of preterm delivery when the depth of excision was ≤ 10 mm (risk ratio (RR) 1.04, 95% CI: 0.78–1.38) or 10–14mm (RR 1.30, 95% CI: 0.99–1.71), however the risk was higher for a depth of 15–19mm (RR 1.65, 95% CI: 1.18–2.31), for very large excisions (≥ 20 mm) (RR 1.79, 95% CI: 1.25–2.57) and for those with multiple excisional treatments (RR 1.86, 95% CI: 1.24–2.78). The absolute risk of preterm delivery following a punch was 9.8%, 9.7% for excisions <10 mm, 11.8% for excisions 10–14mm, 15.4% for excisions 15–19mm, and 16.7% for both excisions ≥ 20 mm and multiple excisions.

The risk of preterm delivery in women treated in England was substantially less than in other studies. In fact the increased risk was largely restricted to women with multiple or very large excisions which carried close to double the risk when compared to those who receive a punch biopsy only.

ALTERATIONS ON HPV-RELATED BIOMARKERS AFTER PROPHYLACTIC HPV VACCINATION

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Aim: to investigate whether HPV vaccination can alter HPV-related biomarkers in women referred for colposcopic evaluation.

Material & Methods: Design: prospective observational study. Setting: University Hospital of Ioannina. Population: Women attending colposcopy clinic for further assessment of abnormal cytology who were advised and accepted HPV vaccination, were compared with a similarly referred group without vaccination. Women requiring treatment were excluded. Intervention: HPV vaccination (Cervarix or Gardasil). An LBC sample was obtained prior and after the completion of the vaccination regime that was tested for a number of HPV-related biomarkers including HPV typing and E6 & E7 mRNA (NASBA & flow cytometry) and p16^{INK4a}. Outcomes: Alterations of HPV-related biomarkers at 6m time visits after initial evaluation in both groups. Analysis: The p-values, Relative Risk (RR), Absolute Relative Risk (ARR), NNT and 95% Confidence Intervals for each group were assessed.

Results: A total of 365 women were included. One hundred thirty-one women were vaccinated (Group A). HPV vaccination reduced statistically significant the HPV positivity rates for 16 and 18 subtypes ($p=0.008$) in women tested positive with activated HPV infection 16 or 18 prior to the vaccine. The same significant reduction was not shown for the women tested negative for mRNA E6 & E7 expression ($p=0.879$).

Conclusions: HPV vaccination appears to reduce significantly the rates of positivity for 16 or 18 activated HPV infections and possibly could enhance HPV clearance. HPV vaccination doesn't seem to affect the simple not integrated HPV infections.

LONG-TERM DATA ON THE EXPRESSION OF HPV-RELATED BIOMARKERS AFTER TREATMENT FOR CIN

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Aim: To assess the long-term alterations in HPV related biomarkers pre- and post-treatment for CIN and to verify their role as a prediction tool for recurrent disease.

Material & Methods: Design: Prospective observational study. Setting: University Hospital of Ioannina. Population: Women planned to undergo LLETZ for CIN. Intervention: An LBC sample was obtained prior to treatment (time 0) and was repeated at 6,12,18,24,30,36 months after treatment. This was tested for HPV-related biomarkers. Outcomes: We calculated trend of positivity of HPV-related biomarkers after CIN treatment. Biomarkers' Sensitivity(S), specificity (Sp), PPV and NPV were also assessed. Analysis: We calculated expression rates for each one of the HPV-related biomarkers prior to the treatment and at follow-up visits.

Results: Of 368 women included, histology showed CIN2+ in 298 cases. Eighteen individuals underwent second treatment. HPV-DNA appeared to be positive in 32.9% at the second follow-up visit and in 36.4% of the cases 2 years post-operatively. The NASBA test was positive prior to the treatment in 45% of the cases, and 5% at the 4th follow up visit. Flow cytometric evaluation of mRNA E6&E7 appeared to be positive in 33.3% at the 24months visit. The best sensitivity for the prediction of treatment failures was performed by HPV-DNA (65.8%) with PPV=96.2%. The NASBA test appeared to have the best specificity (93.8%) in identifying women with < CIN2+ lesions.

Conclusions: CIN treatment leads to a significant reduction in positivity for all HPV-related biomarkers. It appears that this is reduced due to the treatment itself. The application of HPV-related biomarkers (single or combinations) during follow-up, could enhance early prediction of recurrent disease.

HPV-NEGATIVE CANCERS IN VULVAR LICHEN PLANUS

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Background: Only 50% of vulvar cancers are induced by Human Papilloma Virus (HPV). HPV-negative squamous cell carcinomas (SCC) arise often in the background of lichen sclerosus, a common vulvar dermatosis. In contrast to the acknowledged association lichen sclerosus with vulvar SCC, malignant transformation and SCC arising in vulvar lichen planus (LP), a less common dermatosis also affecting vaginal and urethral mucosa, is poorly documented.

Methods: Vulvar SCCs arising in LP were evaluated for HPV-status location, p16ink4a and p53-expression, clinical course, precursor lesions, and monoclonally rearranged T-cell receptor gamma locus (mTRG@).

Results: 31 women with a median age of 67 years (range 38-90 years) presented with a HPV-negative SCC. 26 woman had a solitary SCC and 5 women presented with multiple primary SCCs (5p T1a, 17 pT1b, 9 pT2). The SCCs arose in periclitral location, in the interlabial sulci, on labia minora and around the vestibule. SCC in LP involving the hairbearing vulvar skin was not observed. At initial presentation, regional lymph node metastases were present in 13/31 (42%) women and lung metastases in 1/31 patient. 30/31 women had a surgical resection of the SCC. 11/30 (35%) patients with completely resected primary SCC developed between 1-4 de-novo SCC and / or differentiated vulvar intraepithelial neoplasia (d-VIN) in the residual LP. They arose mostly within 12 months. 1/31 woman had a primary chemo-radiation. She developed 2 recurrences at the sites of the primary SCCs. All SCC expressed p53. Peritumoral and recurrent d-VIN lacked p16^{ink4a}-overexpression and revealed basaloid, non-keratinizing, flat, verrucous, hyperkeratotic differentiation with p53-expression. 10/31 (32%) women died of disease at a median time of 20 months (range 7-94 months), 2 died independent of disease, 4 patients were lost to follow-up after 18-92 months and 15 patients are still alive.

Conclusion: LP-associated SCCs are very aggressive malignancies with a cancer-associated death in 30% of patients, a high rate of lymph node metastases at presentation and a 40% rate of recurrent cancers in lesions of residual LP. LP-associated cancers arise typically in periclitral and vestibular, non-hair bearing mucosa of young and elderly women via the precursor lesion differentiated VIN.

BOOK OF ABSTRACTS – POSTERS

P 1

UMBILICATION IS A STRONG PREDICTOR OF HIGH-GRADE CERVICAL INTRAEPITHELIAL NEOPLASIA

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Objective: To assess the diagnostic value of the colposcopic feature of umbilication for detecting high-grade cervical intraepithelial neoplasia (CIN 2/3).

Materials and methods: Study included 430 randomly selected women who underwent conization for CIN 2 or CIN 3. The control group consisted of 102 patients with biopsy confirmed CIN 1. Colpophotographs and reports from colposcopy examinations from all patients were retrospectively analysed by two independent colposcopy experts with the aim to assess the presence of umbilication. The occurrence of more than two mosaic 'tiles' with central punctation was considered to be a positive finding regardless of whether the mosaic pattern was coarse or fine. The prevalence of umbilication in CIN 1 and CIN 2/3 respectively was compared. The diagnostic value of umbilication alone and combination of umbilication and/or ridge sign was assessed.

Results: Umbilication was detected in 10% and ridge sign in 10.2% of patients with CIN 2/3. Simultaneous presence of umbilication and ridge sign was rare (1.1%). The sensitivity and specificity of umbilication solely for the detection of underlying CIN 2/3 was 12% and 100% with positive predictive value of 100%.

Conclusion: Umbilication is an age-independent colposcopic feature with very high specificity for predicting CIN 2/3.

P 2

THE RISK FACTORS FOR DEVELOPING ANAL HPV INFECTION IN WOMEN WITH CIN 2+

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Objectives: About 90% of anal cancers are associated with the human papillomavirus (HPV) infection. The aim of our study was to describe the risk factors for development anal HPV infection in HIV-negative women treated for high-grade cervical intraepithelial neoplasia (CIN 2+).

Methods: Altogether 272 women 19 – 74 years old were enrolled. The study group included 172 women who underwent conization for CIN 2+. The control group consisted of 100 women with non-neoplastic gynecologic diseases. All participants completed a questionnaire detailing medical history and sexual risk factors and were subjected to the anal and cervical HPV genotyping using Cobas HPV test.

Results: Cervical, anal, and concurrent cervical and anal HPV infections were detected in 82.6%, 48.3% and 42.4% women of the study group, and in 28.0%, 16.0% and 8.0% women of the control group, respectively. The subgroup with concurrent infection (n=73) reported significantly more occasional contact with anus (no anal coitus) according to reference

group with no contact (OR 2.62; 95% CI: 1.28–5.35, p=0.008) and common contact with anus (OR 1.96; 95% CI: 1.02–3.73, p=0.049). Any frequency of anal contact (occasional and common together) was significant (OR 2.43; 95% CI: 1.23–4.79, p=0.010) in contrast to practising of anal intercourse (OR 1.54; 95% CI: 0.82–2.87, p=0.176). Other evaluated risk factors (smoking, presence of autoimmune disease and/or condylomata acuminata, early sexual debut, high number of sexual partners, unprotected vaginal coitus, practising of anal coitus) did not reach level of significance.

Conclusions: Anal high-risk HPV infection is significantly more frequent in women with CIN 2+. Any type of contact with anus with any frequency is showed as an important risk factor for concurrent cervical and anal infection among patients with CIN 2+.

P 3

EUROPEAN FEDERATION OF COLPOSCOPY TRAINING CURRICULUM CORE COMPETENCIES: A DELPHI CONSENSUS STUDY

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Background: In 2000 a list of 51 core competencies required for colposcopic practice was determined by experts from 21 countries through a Delphi study. In view of changes in colposcopic practice that have occurred over the past decade and the expansion of the European Federation of Colposcopy (EFC), the decision was made for a review of the contents of the training curriculum and to repeat the Delphi study in order to gain approval for any changes from the EFC membership.

Methods: A two-round Delphi consultation was conducted with representatives from the 30 full, 5 associate and 4 potential member countries. Participants were asked to give their opinion as to the importance of each of the current competencies using a 5-point Likert scale. Round 2 enabled the participants to revise their scores in light of the scores given by the group as a whole in round 1.

Results: Responses were received from 28 (93%) EFC members, 4 (80%) EFC associate members and 2 (50%) potential member countries. Of the 51 competencies previously identified only 2 did not receive support to be included in the revised curriculum: 'perform bacterial swabs' and 'provide data to national body'. There was no significant difference in the responses given by member, associate member or potential member countries.

Conclusions: This study has enabled a consensus opinion from 34 countries on the contents of the EFC core curriculum. The revised curriculum has a mandate from the EFC member countries to be implemented across Europe as the standard for colposcopic training.

P 4 NEUROENDOCRINE CARCINOMA OF THE CERVIX: A REVIEW OF CYTOLOGY AND HPV INFECTION

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Background: Neuroendocrine carcinomas (NEC) of the cervix are uncommon and little has been reported on the role of cytology and pattern of HPV infection.

Methods: All patients diagnosed as having an NEC in the West Midlands between 1998–2009 were reviewed. A blinded specialist review of all pathology specimens and immunohistochemistry was performed to confirm the diagnosis. HPV testing was performed on paraffin-embedded tissue curls using both the PapillpCheck and Abbott tests.

Results: 45 cases were identified, 1.3% of all the cervical cancers registered in the West Midlands. Pathological review confirmed only 31/45 cases to be NECs (23 small cell, and 8 large cell tumours, of which 30% were mixed tumours with squamous or adenocarcinomatous components). Cytology was not helpful in the early detection of NEC, even when a squamous or glandular component was present in mixed tumours, with only 1/31 (3.2%) NEC cancer being screen-detected as compared to 19.7% of the cervical cancer population as a whole. The majority of cases, 12/31 (38.7%) were classified as interval cancers, with 54% of women only ever having had negative smears. HPV testing identified HPV18 as the most common subtype in 78.6% of cases, whereas HPV16 infection was seen in 67.9% of cases. All mixed tumours containing adenocarcinoma were positive for HPV18. The overall survival was very poor, 54% at 1-year and only 8/31 women were alive at 2 years.

Conclusions: Neuroendocrine cancers of the cervix, even of mixed type, are not typically detected through cervical screening and present with advanced disease. The aetiology of these rare tumours has yet to be elucidated but if HPV is a causal factor then the current vaccines targeting HPV16 and 18 should prevent their development.

P 5 DIAGNOSTIC VALUE OF TRUSCREEN, CYTOLOGY AND COLPOSCOPY

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Aim: The aim of this study was to compare the diagnostic value of TruScreen[®] with that of already approved in practice methods for detection of precancerous conditions of the cervix. This study reviewed 301 patients; for analysis were included 260 women aged from 16 to 69 years, mean 35.82 years. They were divided into three groups: Ist group – patients that were screened by cytology, IInd group – patients with colposcopy and IIIrd group – patients, examined with TruScreen[®] (spectrophotometry of the uterine cervix). All of the patients underwent biopsy as gold standart for verifying the real condition of the tissues.

Results: After statistical analysis of the results we found sensitivity of conventional Pap smear, colposcopy and TruScreen[®] respectively 67.44%, 96.55% and 53.85%; and specificity respectively 83.93%, 45.90% and 78.79%.

Conclusion: TruScreen is a representative of real time methods for cervical screening.

Our results are close to the obtained in other studies: medium value sensitivity and high specificity of the method, which shows that there is a possibility for its use as a primary screening, and also in addition to cytology. TruScreen is especially suitable in places where no cytology laboratories and specialists are available. It is a quick method (result at the moment), does not require special qualification and long training of the operator (as opposed to colposcopy) and is well received by women. Sufficient number of cases remains to be collected for more accurate assessment of the potential of TruScreen. It is appropriate to identify if TruScreen has different diagnostic value in mild and severe cervical changes, and also its efficacy as a primary screening method and in combination with other already approved in practice screening methods.

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P 6 TREATMENT OF PAGET'S DISEASE OF THE VULVA WITH IMIQUIMOD: A RETROSPECTIVE, MULTICENTER STUDY

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Objective: The aim of this study was to evaluate Imiquimod as local treatment of first-time and recurrent EMPD.

Methods: All cases of biopsy-proven EMPD of the vulva treated within the German Colposcopy Network or other institutions specialized in vulvar diseases in Germany were included in this retrospective analysis.

Results: 21 women with EMPD treated with Imiquimod were identified: 11 (52.4%) achieved complete response, 6 (28.6%) achieved partial response and there were no cases of progressive disease. The dose and duration of Imiquimod differed between patients. The mean duration of treatment exceeded 16 weeks in women achieving complete response.

Conclusion: When associated cancers and invasive growth are excluded, Imiquimod appears to be a useful treatment option for recurrent EMPD and may avoid extensive mutilating surgical treatment.

P 7

PREVALENCE OF HPV IN GEORGIA

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In Georgia as in the worldwide, cervical cancer is on the second place by frequency and mortality in women, after breast cancer. According to the data of The World Health Organization, in Georgia every year reveals 350 new cases of cervical cancer and 170 women die of this disease. Disease indicator is 13.9 on 100 000 women. It should be said that in this regard, Georgia belongs to the group of European countries where the disease indicator is lower than average. The indicator of our country is different in various regions. According to the research, in western Georgia cases of cervical cancer were three times more compared to eastern Georgia. The indicator of incident during the last two years decreased by 24, 8%.

Purpose: Based on the above, the purpose of our research is to present epidemiological data evaluation of HPV spread in patients of different ages in Georgia, who had cervical lesions and different degrees of dysplasia.

Methods: All the dates were collected from the period between 2010–2013. We examined 939 different ages women. All women underwent a gynecological consultation as well as cytological and colposcopy researches. In the case of high-grade dysplasia was carried out cervical biopsy and further histomorphological research. All patients underwent human HPV genotyping, for exact evaluation of virus type. The research was carried out by polymerase chain reaction, after what was typing of HPV. In 238 patients detected high and medium onco – type of HPV.

Results. HPV type 16 – identified in 17 patients, HPV type 31 – in 10 patients, HPV type 68 – in 9 patients, HPV type 51 – in 11 patients, HPV type 33 – in 8 patients, HPV type 66– in 7 patients, HPV type 52 – in 5 patients, HPV type 18 – in 6 patients, HPV type 58 – in 5 patients, HPV type 59 – in 4 patients, HPV type 45– in 3 patients, HPV type 56 – in 3 patients, HPV type 35 – in 2 patients. According to polymerase chain reaction, result of research showed that in 55% of low-grade intraepithelial neoplasia is marked low oncogenic HPV DNA, but in the case of high-grade intraepithelial lesions and invasive carcinoma in 88% – high oncogenic HPV DNA. In the case of mild dysplasia is marked a wide spectrum of this virus. In the case of high-grade lesions and invasive carcinoma cells are damaged by type 16 of virus.

Conclusion: Research in Georgia showed that in the case of cervical cancer in 97,7% found HPV type 16, in 7,1% – type 31, in 4,2% – type 68. It should be noted that HPV type 18 takes the eighth place in the framework of this research. CIN1 – in 55% is marked low oncogenic HPV DNA, in case of CIN2, CIN3 and invasive cancer – 88% high oncogenic HPV DNA. The converged of cervical cancer spread on the territory of Georgia, mostly found following oncotypes of HPV: 16,31,68,18 than other types. Among them oncotype 16 consist of 50%, so HPV type 16 dominates, it needs less time for persisting.

P 8

SIX YEARS OF HPV VACCINATION IN CZECH REPUBLIC

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The possibility of HPV vaccination started in Czech Republic in December 2006.

On the end of 2011 totally 174 000 women were vaccinated. It means that around 14,5% women of 9 – 26 age are covered by it. It was paid by private money of women. We have evaluated age distribution of vaccinated women in multicentric study. In common practice about 6% of women were over 26 years, 38% were in age 15 – 17 and 56% were in age 18 – 25. The proportionality of quadrivalent and bivalent vaccine was 71% to 29%. Vaccination was mainly in gynecologic offices.

From April 2012 the age cohort of vaccination have been started. It is covered by health insurance system for girls at age of 13 year. This cohort have about 50 000 girls. Percentage of these girls taking part in this programme will be evaluated. The proportionality of vaccine is in opposite to private system. The bivalent vaccine is completely covered by insurance, vaccination is applied especially by pediatrics. Next twentyfive thousands of womens were vaccinated outside of cohort.

Causes of this situation are discussed.

P 9

TYPE RELATED PREVALENCE AND PERSISTENCE OF HPV INFECTIONS IN WOMEN BORN IN 1988/89

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Background: High-risk human papilloma virus (HR-HPV) infection is associated with the development of cervical cancer. HPV vaccination reduces the risk of developing malignant lesions and is expected to change the dynamics of HPV transmission. Data from non-vaccinated women may provide an important benchmark to allow the impact of HPV vaccination programs to be assessed. This study was designed to prospectively determine the changing dynamics of HR-HPV infection and associated genital diseases in young women, most of whom were non-vaccinated.

Methods: Data from a population-based cohort study, comprising women of a predefined birth cohort (women born in 1988/89), were analyzed between 19 October 2009 and 31 December 2011 to determine risk factors for high-risk HPV infection and the association between specific HR-HPV types and atypical Pap smear test results. HPV status was determined by Hybrid Capture 2 (HC2) assay and genotyping.

Results: The prevalence of HR-HPV was 27,2% in the 1988/99 cohort (226/832). In follow up one year later 31,8% (47/148) obtained a negative HPV test. 606 were initially HR-HPV

negative, there from 11.4% were retested HPV positive in follow up about one year later. HPV16 positive-women were significantly more likely to have abnormal Pap smears of any degree than HPV16-negative women (9.09% versus 2.52%, $p = 0.0482$ for the 1988/89 cohort). CIN3 was diagnosed in two women.. All women with CIN3 tested positive for HC2-HR. Rate of HPV16 infection was significantly lower in vaccinated than non-vaccinated women (1.59% versus 8.88%; $p = 0.003$).

Conclusion: HR-HPV infection was highly prevalent and associated with an increased risk of abnormal Pap smears and biopsy proven CIN2+. In this group we found a high switch from HPV positive to negative within one year. HPV16 infection was associated with a high risk of clinically relevant lesions. HPV vaccination significantly decreased the risk of HPV16 infection.

P 10

TRACHELECTOMY IN HPV RELATED CERVICAL DYSPLASIA

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Introduction: HPV stands for human papilloma virus.Certain strains of HPV can cause changes in the cells of the cervix, a condition called cervical dysplasia. If untreated, dysplasia can progress to cervical cancer.HPV is almost always the cause of cervical cancer.

Material and Method: The authors present the case of patient EAP,aged 41,who had been hospitalized with the diagnosis of severe cervical dysplasia CIN III, HPV positive.

Results: Trachelectomy with tracheloraphy was recommended and performed,followed by Silgard vaccine. Control tests after 6 months and one year revealed the cervix without obvious lesions and HPV negative, proving that trachelectomy with tracheloraphy was the best option for treatment.

In our department,trachelectomy is the recommended therapeutic procedure for this affection.We performed a trachelectomy with tracheloraphy in this patient's case,followed by Silgard vaccine.The very good post – surgery evolution made discharge possible after 4 days.Control tests after 6 months and one year revealed the absence of HPV traces in the analyzed tissues.

Conclusions: The excellent results we had with this procedure led us to the conclusion that in cases of HPV related cervical dysplasia,in order to prevent an evolution towards cervical cancer,surgical intervention is necessary and that the trachelectomy with tracheloraphy should be the first option as recommended treatment.

P 11

OUTCOMES OF A NOVEL METHOD FOR DAY-CASE KNIFE CONE BIOPSY

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Objectives: Knife cone biopsy has historically been associated with both immediate as well as late morbidity. To minimise bleeding, haemostatic stay sutures, vaginal packs, Monsel's solution, electrocautery, vasopressin and tranexamic acid have all been described. We assess a new approach to haemostasis using adrenalin infiltration, electrocautery and oxidised regenerated cellulose.

Method: All cases of knife cone biopsies performed by the same clinician between March 2010 and December 2012 were reviewed retrospectively. Follow up data will be presented in all cases with colposcopy and cytology findings at six months.

Results: 42 cases were identified with a median age of 40 years. The indications for knife cone biopsy were cancer (4), possible invasion (9), CGIN (10), persistently borderline smear (3), borderline glandular smear (1), unsatisfactory colposcopy (3), and high grade CIN (12). The procedure took between 5 and 40 minutes, with the median being 12 minutes. All cases went home on the same day. The blood loss was described as minimal (<100mls) in all but two cases which required a haemostatic suture insertion while in theatre. No patient required a vaginal pack and catheter. One case was re-admitted on day two due to bleeding and suspected infection. Depth of cone biopsy obtained ranged from 6mm to 75mm, with median of 15mm. 95% were greater than 7mm. The median volume of the cone biopsies was 6.09cm³. The histology confirmed high grade CIN in 18 cases (42.9%), CGIN in 4 cases (9.5%), cancer in 7 cases (16.7%). Of the 13 normal results, high grade disease, CGIN or cancer had been identified in 7 patients at colposcopy, 4 had been referred due to persistent borderline smears and 2 patients had unsatisfactory colposcopy. Biopsy margins were described as inadequate in 12 cases (29%), 7 of which were high grade CIN and 4 were previously undiagnosed cancer. One case of CGIN was described as inadequate. After excluding the 8 patients referred to a cancer centre, three patients required retreatment before 6 month follow up (one repeat knife cone biopsy and 2 simple hysterectomies).

Following treatment six month follow up data was obtained for 29 patients with 3 lost to follow up. The remaining 10 patients had had definitive treatment.

Conclusions: This study suggests that this new technique is safe and quick, demonstrated by the short operating time, day case turn around and minimal complication rate with only one readmission. Adequate biopsy size is attainable in most cases. Although margin clearance was described as inadequate in 29% of cases, early repeat local treatment was only required in one case. Therefore we conclude that this is an effective treatment option for patients requiring conisation. This study is limited by the small population and patients lost to follow up.

P 12

THE IMPACT OF THE HPV VACCINATION PROGRAMME ON COLPOSCOPY PRACTICE IN SCOTLAND

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Background: In Scotland a school based immunisation programme was introduced in 2008 for 12-13 year old girls with an initial 3 year "catch up" for girls up to 18 years. Organised cervical screening commences at age 20 years in Scotland and women are invited for 3 yearly screening until aged 60. Women offered the vaccine as part of the catch-up programme will thus have been invited for cervical screening since 2010. Due to our National data systems and linkages, we are able to monitor the impact of the immunisation on cytology referrals to colposcopy, treatment and levels of CIN.

Aim: To quantify the impact of HPV immunisation on routinely collected colposcopy data in Scotland including treatment, pattern of (cytology) referral and prevalence of CIN.

Methods: The National Colposcopy Clinical Audit and Information System is used by all colposcopy

clinics in Scotland with local, regional and national data available on referral cytology, interventions and histology results from any colposcopy visit. We obtained approval from the Scottish Colposcopy QA Group, the Caldicott guardians on each Scottish Health Board and the NRES-North of Scotland Committee to access NCCIAS data.

Results: When the vaccine was initially introduced, a catch up programme to provide the vaccine for girls aged 14-17 (born after 1 September 1990) with 65.5% of the catch up cohort in Scotland receiving the full three doses. Uptake in the school based programme has reached levels of 90%. From NCCIAS, we are able to report on the rates of cytology referrals, CIN detection and treatment from all colposcopy clinics in Scotland.

The relative rates for CIN 3 per 1000 person year split by number of doses of HPV vaccination received were 1.0 for unvaccinated women and 0.696 for women who had received all doses ($p=0.0368$).

Conclusions: Currently women who were offered the HPV vaccine in the catch-up programme are participating in screening and those with an abnormal cytology are seen at colposcopy. Even with vaccination over the age of 15 years, we observed a reduction in the risk of CIN3. We will present data which will provide valuable insight into the vaccine driven changes to disease and practice at colposcopy.

P 13

HPV VACCINATION AND HPV DNA AND MRNA GENOTYPES IN YOUNG WOMEN WITH ABNORMAL CERVICAL CYTOLOGY

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Background: The UK HPV school based immunisation programme was introduced in 2008 with around 90% uptake rates. Cervical screening commences at age 20 years in Scotland and women offered the vaccine in the catch-up programme started to attend for cervical screening in 2010. It has been suggested that HPV 16 causes more definite visual abnormalities on the cervix, which could mean CIN is harder to detect in immunised women.

Aims: To identify the impact of immunisation on the pattern of referral cytology to colposcopy and to determine if there is an association between HPV type and colposcopic features of CIN in women who have received the HPV 16/18 vaccine.

Methods: A pragmatic cross sectional study was conducted with women aged 20-25 attending colposcopy clinics in Aberdeen following an abnormal cervical cytology result. Cervical samples were obtained for HPV DNA genotyping and E6/E7 mRNA expression. Colposcopic features were recorded. Chi square analysis was conducted to identify any associations between colposcopic findings and HPV genotypes.

Results: There was a significant association ($p=0.025$) between vaccine status and referral cytology (low or high grade). Only unvaccinated women were referred with severe dyskaryosis or glandular abnormalities. The proportion of women with an HPV16 infection

was significantly reduced from 52% in the unvaccinated cohort to 8% in the vaccinated cohort ($p<0.001$). The prevalence of HPV18 was also reduced in vaccinated women, from 13% to 4%. Although HPV 16/18 were reduced in vaccinated women, the performance of colposcopy was not significantly affected in terms of sensitivity (for CIN2+) and the ability to detect colposcopic features. However, HPV 16 infections were associated with high grade colposcopic impressions ($p=0.009$).

Discussions: This is the first study to investigate colposcopy performance in vaccinated women where comprehensive HPV typing information is also available. Our preliminary results indicate that immunisation does not confer a negative impact on colposcopy. We will also present data on HPV mRNA expression relative to colposcopy/pathology findings. Our data are of particular relevance to countries that have introduced the HPV vaccine who also have colposcopy services.

P 14

FOCALITY AND CENTRICITY: EFFECT ON MANAGEMENT AND RECURRENCE OF VIN - A 10 YEAR REVIEW

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Introduction: Vulvar intraepithelial neoplasia (VIN) describes squamous dysplasia of the vulval epithelium which may progress to invasive cancer. It represents 1 of 4 lower genital tract dysplasias, alongside cervical, vaginal and anal dysplasia; patients with more than one type can be described as having multicentric disease.

Method: A retrospective cohort study of all cases of VIN managed at Imperial College NHST over 10 years was performed. Univariate analysis using permutation Chi Square tests (10,000 permutations) were used to evaluate statistical significance.

Results: Ninety cases were reviewed. Median age at first presentation was 45 years (range 20-86). Of those treated, 74% (67) had excisional treatments, 17% (15) had a combination of excision and topical Imiquimod therapy and 4% (4) had vulvectomy. The overall recurrence rate was 63% (57), of which 48% recurred within the first year, 26% within 3-5 years and 19% over 10 years later.

63% (57) had multifocal VIN, of which 42% (24) also had or developed multicentric disease. The overall rate of multicentricity was 37% (33). Statistical significance was found when comparing centrality/focality of disease with both interval to recurrence and final diagnosis (P values <0.001 and 0.0019 , respectively). Recurrence within 1 year was highest overall in those with multifocal and multicentric disease ($P<0.001$).

7% (6) developed invasive squamous cell carcinoma; 67% of whom had multifocal disease and of which 50% also had multifocal/multicentric disease ($P 0.0019$). 7% developed microinvasive disease, all of whom had multifocal VIN and 50% of whom also had multicentric disease.

Risk factors for VIN included immunosuppression and encompassed 20% (18) of the group. The majority were HIV+VE (11%), on immunosuppressive treatment (6%) or previously had solid organ transplants (3%). Immunosuppression was most commonly associated with VIN3 (72%) although this was not significant (P value 0.8355). In those that recurred, the time interval to recurrence was significant (P value 0.0259) at 33% within 1 year, 41% within 3-5 years and 6% after 10 years.

Conclusion: VIN is a premalignant condition that requires specialist care. Those with

multifocal and/or multicentric disease or known immunosuppression should be regarded as high-risk patients. Classification by this method may be used to predict those at risk of disease progression from low- (2 areas of neoplasia) to high-order (3/4) multicentricity, or indeed invasive disease and therefore plan future management. In those with multifocal VIN, adjunctive imiquimod may be considered on an individualized basis. Women in these groups may be more appropriately managed in a dedicated clinic with access to multi-disciplinary services.

P 15

LLETZ IN THE UNIVERSITY HOSPITAL 'SESTRE MILOSRDNICE', ZAGREB, CROATIA

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Introduction: Large loop excision of the transformation zone (LLETZ) provides a pathologic specimen similar to a cold-knife cone (CKC) biopsy of the cervix. LLETZ is done after abnormal Pap test results have been confirmed by colposcopy and cervical biopsy. Thermal coagulation necrosis caused LLETZ as well as detection of residual premalignant lesions after surgery are the main problems of this procedure.

Objective: This study was conducted to review the 16-year experience of the use of large loop excision of the transformation zone (LLETZ) in our Hospital in order to prevent malignant lesions of the uterine cervix.

Material and Methods: Retrospective study was performed through the period between years 1995 and 2011 including 1018 women with cervical dysplasia treated with LLETZ. Women were divided by age, cone biopsy histology results, biopsy results of the endocervical curettage specimen and the results of the cone margins histology.

Results: Age distribution showed that LLETZ was most commonly performed in the age group 25-35 years (51%; 514/1018), followed by the age group 36-45 years (22%; 220/1018), and the least commonly performed in the age group over 65 years (2%; 18/1018). In the age group 25-35 years cone biopsy result CIN 2 or worse was present in 84% (431/514) of cases. In the age group 36-45 years cone biopsy result CIN 2 or worse was present only in 50% (9/18). Overall biopsy result lower than CIN 2 was found in 23% (232/1018) of patients, while CIN 2 or worse was present in 77% (786/1018) of patients. Only one patient, 0,09% (1/1018), was diagnosed as invasive planocellular cancer. Residual dysplasia at the cone margins was found in 4,2% (43/1018) of cases. Endocervical curettage histology result was positive in 10% (99/1018) of cases.

Conclusion: LLETZ is highly effective, affordable and low-cost treatment option of the premalignant cervical lesions. However, it requires continuous education and training of the whole team. Colposcopy plays an important role when making the decision about the right type of treatment for the patient. Accurate colposcopic exam and findings help us avoid the overtreatment, which in our retrospective study was higher than we had expected. The aim of the new colposcopic classification (IFCPC Rio Congress 2011) is towards to achieve better

colposcopic diagnose in order to prevent as well overtreatment of low grade dysplasia as undertreatment of high grade dysplasia not recognized in cytological screening.

P 16

COLPOSCOPIC AND CYTOLOGIC FINDINGS OF ISOLATED PEMPHIGUS ON CERVICAL AND VAGINAL MUCOSA

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Pemphigus vulgaris is an immunobullous disease, caused by autoantibodies directed against desmoglein 1 and 3, which are key adhesion molecules that keep cells attached to each other: the effect is cell detachment and acantholysis with consequent blistering of skin or mucosa (oral, genital). The reports of cervical or vaginal localization of pemphigus in patients with full-blown skin disease are sporadic, but not exceptional. Extremely rare is, however, the description of isolated localization of pemphigus lesions on the genital mucosa. We describe three cases in which the first and only manifestation of the blistering disease was at cervical and/or vaginal level. In all 3 cases the clinical onset consisted of abnormal cytology. The first case was a 43 year old with repeated ASC-US during screening: squamous intermediate cells, with big nucleus, intense but regular chromatin, colposcopy revealed a cervical raised lesion on the posterior lip, with tendency to exfoliate (Nikolsky positive). In the second case a 48 year old had a cytologic report of ASCUS/AGC: cells were single and in loose clusters, having vesicular nuclei, a thin nuclear membrane, prominent nucleoli and well-defined cytoplasmic margins. Colposcopy showed a cervical superficial rounded erosion, consequent to the rupture of a small blister, and slightly hyperemic background. In the third case, 58 year old, the localization was cervical and vaginal, with an erosion on the anterior fornix, cytology was ASC-US. In all cases, histology confirmed the acantholysis and suprabasal bullae, direct immunofluorescence showed intraepidermal positivity. Thorough examination of skin and oral cavity excluded concomitant localization in other sites. Treatment with oral corticosteroids has been effective in controlling the local disease and avoiding progression or diffusion of the blistering process. Cytopathologists should be aware of the cytologic features of pemphigus vulgaris and should at least suspect this entity in even rare sites like the cervix. Colposcopists who evaluate patients with minor cytologic abnormalities (ASCUS) should consider this disease as well. A false positive diagnosis of malignancy can be avoided, and an early medical treatment of pemphigus may prevent from more diffusive disease.

P 17

HPV VACCINATION: A POPULATION BASED ASSESSMENT FOR A BETTER PREVENTION

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Background: In France, HPV vaccination had been advised and reimbursed for girls aged 14 from 2007 to 2012, with catch-up vaccination possible until age 23. In 2013, guidelines were updated with vaccination still reimbursed but recommended for girls between 11 and 14 and catch-up vaccination reduced to girls aged up to 19. No vaccination program per se has been implemented over the period. Since 1994, the EVE association has been

conducting a cervical cancer screening program in the Alsatian region.

Objectives: Assess the impact of HPV vaccination on HPV induced cervical lesions, on screening and on viral ecology. Improve vaccination practice.

Population and methods: We performed a cohort of all vaccinated girls after June 2009 and living in Alsace thanks to Health and Social Security's data on vaccine reimbursements. Data are validated by questioning patients or practitioners, especially when vaccination seems not to be complete. This cohort will in the future be compared to the EVE's screening program database and to cancer registries. This will enable us to check that vaccinated women take part in the screening and to detect all cervical lesions among vaccinated people. The vaccination impact will be assessed through the comparison of CIN2+ percentage between vaccinated and non-vaccinated people.

First results: There is no data already available on cervical lesions because patients in the cohort have not turned 25 years old yet. A first assessment of vaccination practice shows that medical practitioners essentially vaccinated patient within the age group (14 – 15) targeted by the guidelines. Nonetheless coverage is low, only 16.8% at 14 in 2011. A reduction of this coverage is observed between 2010 and 2011 certainly due to possible adverse effects mentioned in media. Based on reimbursements' data, complete vaccinations represent only 40.1% of all vaccinations, but according to 95.5% of patients' answers, all three injections were done.

Conclusions: Regarding this study, French data about vaccination only based on reimbursements may not be accurate. Our cohort will permit an assessment of vaccination's impact in everyday life. First results show that efforts are needed in medical training and informing the population to achieve a higher coverage.

P 18

THE ROLE OF mRNA E6/E7 HPV EXPRESSION IN COLPOSCOPY OF CERVICAL INTRAEPITHELIAL NEOPLASIA

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The aim of this paper is the evaluation of combination colposcopy and mRNA E6/E7 HPV detection- as the marker of persistent HPV infection- in the triage of abnormal Pap smears and in the assessment of cervical intraepithelial neoplasia progression risk. The clinical material consisted of 85 women, participating the national cervical cancer screening program in the period of January 2010, till October 2010, referred to the colposcopic clinic of Jagiellonian University Hospital in Krakow, Poland. All subjects were offered gynecological evaluation, Pap smear, colposcopy, DNA HPV (HC2) and mRNA E6/E7 testing (NulciSens Biomerieux). In case of positive tests colposcopically directed cervical biopsy was performed. **Results:** The presence of mRNA E6/E7 HPV transcripts correlated with high grade squamous intraepithelial lesions, statistically significantly. There was statistically significant difference between results of colposcopic and histologic examination concordance comparing to combination of mRNA E6/E7 HPV/colposcopic examination and histology results concordance ($p < 0.001$).

Conclusions: The presence of mRNA E6/E7 HR HPV may be assumed as specific marker of high grade cervical lesions. It's combination with colposcopic evaluation increases the colposcopy concordance with final histologic findings.

P 19

HPV POSITIVE PREGNANT WOMAN – WITH OBSTETRICAL HIGH RISK

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Objectives: Infections with oncogenic strains of HPV represent the main cause of Cervical Intraepithelial Neoplasia (CIN) and of cervical cancer.

The risk factors determining the progression from HPV to cancer are unknown, including the HPV type, the infection intensity, the cell-mediated immunity. The immunologic mechanism can have great relevance within the immunologic changes of pregnancy, where the „immunologic paradox“, the balance between the rejection and facilitation reactions, allowing the trophoblast implantation and maintenance of allograft, can lead to a different behaviour of the organism faced with viral infection.

Methods: The prospective study of HPV infection in pregnant women comprises a number of 20.204 births which took place at Clinical Hospital „Prof. Dr. Panait Sîrbu“ in Bucharest between 2008 and 2012. 11516 pregnant women were examined (57%). The motivation to detect HPV was given by: PAP smear test suggestive of cellular disorders at the level of the cervix = 5588 cases. Positive Colposcopy – 2780 cases. Biopsy was done in 74 cases, with the following results: CIN 1 = 40 cases, CIN 2 = 19 cases, CIN 3 = 10 cases, in situ carcinoma = 4 cases, invasive microcarcinoma = 1 case.

In the cases with suspicion of positive PAP smear and suspicious colposcopy, HPV LR (low risk) strains were found – 5346 cases and HR (high risk) – 109 cases. 5274 cases were known for HPV infections, and in 181 cases, infection was detected during current pregnancy.

Conclusions: We consider the HPV positive pregnant woman to have an obstetrical high risk for the following reasons:

- the persistence of HPV infection in the genital tract cannot be controlled with the known methods;
- the frequency of HR lesions imposes the detection of strains with this potential, as well as birth by C section;
- the frequency of HPV infection with ascending transmission to the newborn requires effective detection to avoid child infection

P 20

IMPROVED ACCURACY FOR DETECTION OF HG-CIN USING ELECTRICAL IMPEDANCE SPECTROSCOPY (ZedScan I)

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Objective: To determine if electrical impedance spectroscopy (EIS) device (ZedScan I) improves the diagnostic accuracy of colposcopy when used as an adjunct.

Methods: 474 women were recruited at two colposcopy clinics in England, one in Ireland. Phase one assessed EIS against colposcopic impression and histopathology of the biopsies taken. By comparing measured EIS spectra with 'finite element models' of cervical tissues, it was possible to derive a probability index for the presence of HG-CIN. A probability index

value for the detection of HG-CIN (CIN2+) was derived to indicate sites for biopsy in phase two. The disease reference standard was defined as 'histologically confirmed HG-CIN in any biopsy suggested either by the colposcopist or by EIS, where the EIS measurement exceeded the median for HG-CIN derived from phase one'. The data were analysed on a per woman basis and for a single EIS guided biopsy. 214 were eligible for analysis in phase one, 215 in phase two. Average age was 33.2 (median age 30.3; range 20–64). 48.5% (208/429) had high grade cytology, 44.3% had HG-CIN. The performance of colposcopic impression was Sens 73.6%, Spec 83.5%, PPV 78.1%, NPV 79.8%. ZedScan I, as an adjunct, increased the accuracy of colposcopic impression to detect HG-CIN increased from 79.1% to 83.2% ($p=0.05$) and from 63.5% to 75.5% ($p<0.001$) for HG-CIN detected on any biopsy. The positive likelihood ratios increased from 4.46 to 8 ($p=0.03$) and 1.43 to 2.53 ($p<0.001$) respectively. Receiver operator characteristic (ROC) to detect HG-CIN as an adjunct had an area under the curve (AUC) of 0.887 (95% CI 0.840–0.934) to detect HG-CIN.

Conclusions: ZedScan I used as an adjunct to colposcopy improves colposcopic accuracy. The use of ZedScan I could lead to more appropriate patient management with lower intervention rates.

P 21 EFFECTIVENESS AND SAFETY OF LONG-TERM FOLLOW-UP WITHOUT TREATMENT OF LOW GRADE SIL OF THE CERVIX

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Objectives: Excisional treatments of precancerous lesions of the cervix are associated with a significantly increased risk of preterm birth and obstetric morbidity. Considering the natural history of CIN, it is advisable, particularly for women under 40–45, to abstain from treatment in case of Low-grade lesion (HPV ± CIN1). However, strict follow-up is needed for these patients, in fact it is reported that this option is preferred by the majority of them, rather than immediate treatment. We analysed the results of periodical follow-up of LSIL patients, to confirm the effectiveness (prompt detection and treatment of progressed lesions and regression or persistence of the remainder) and safety (no risk of invasive cancer during follow-up intervals). Moreover, the progression potential of “vaccine” HPV types and “other” hrHPV types has been compared.

Methods: Patients eligible for the study were 191: age ≤ 45 yy, no recurrent LSIL, hrHPV-DNA positive, satisfactory colposcopy (type 1 or 2 TZ), immunocompetent, no suspicion of endocervical or glandular pathology). Moreover, we divided all LSIL patients followed-up without treatment in two cohorts, according to the presence of HPV 16 or 18 DNA-type (“16–18” group) or the presence of other HR-HPV DNA types (“Others” group). The period of follow-up continued up to 48 months and was conducted 6-monthly with cytology and colposcopy (and biopsy when indicated). During follow-up, in case of progression to HSIL or other indications, excisional treatment was performed: loop excision by radiosurgery or cold knife conization.

Conclusions: 22 cases (11.5%) of LSIL progressed and were promptly treated, the majority of progressions were seen in the first 24 months (19 cases:10%), but in 3 cases (1.5%) occurred in lesions persistent > 24 months. Regression rate was 83.3% (159 cases): 72.3%(138) within 24 months, 11% (21) after a longer FU. After 48 months Follow-Up 10 patients (5.2%) remained

with persistent hrHPV-DNA positive, without significant cervical lesions. No cases of invasive disease were found during follow-up intervals. The prevalence of low-grade (HPV-CIN1) were not significantly different in “16–18” and “others” cohorts. Evaluating the Kaplan-Meier curves of progression/regression/persistence probability during follow-up with Mantel-Haenszel log rank test, no significant differences in progression potential were found in the two cohorts. Vaccine is probably going to revolutionize the policy of cervical cancer prevention, but the importance of rarer high-risk HPV types must not be underestimated.

P 22 IT AND THE BS CCP – AN EVOLUTION OF THE SOCIETY

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When the BS CCP started in 1972 the membership included four Colposcopists operating in three centres in the UK. The goals of the society were fourfold – education, advocacy, the development of new technology and research. During the last forty years the membership has grown to over 3000 Colposcopists in over 210 centres operating in five different organised cervical screening programmes in the British Isles. The functions of the society have become increasingly complex with Certification, Recertification, Training including the OSCE assessment, Basic advanced and Pre OSCE courses and Trainers meetings. Other crucial roles include provision of Information for Women and Healthcare professionals as well as international collaboration in supporting the development of the IFCPC and EFC. The society website aims to support these evolving objectives of the society. The current site dates from 2004 (the year Facebook was first made available to college students in the US) and currently is undergoing a major rebuild. The potential is significant – in the first eighteen months since the launch of the BS CCP Vimeo channel the videos from the annual scientific meetings prove to be successful with over 13,000 views worldwide. The provision of a virtual “office on line” should facilitate many of the organizational tasks regarding management of membership, recertification and training, as well as enhanced social networking potential. This presentation aims to provide information on these developments charting where we have come from and discussing new directions for the future.

P 23 VITOM ASSISTED LOOP EXCISION OF OF HIGH-GRADE CERVICAL INTRAEPITHELIAL NEOPLASIA

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Objective: To compare loop excisions of high-grade cervical intraepithelial neoplasia (CIN 2+) under video exoscopy, i.e. VITOM® System, or colposcopic guidance, with respect to safety and effectiveness, to implement it in daily practice in Germany.

Methods: Multicentric randomized trial of 300 patients, undergoing loop excision for CIN 2+ either under VITOM® System (group A) or colposcope (group B) guidance. Intra and postoperative complications, resection margins, and removed cervical volume in both groups were evaluated.

Results: 19.3% of patients in VITOM® group and 15.5% in colposcopy group ($p = 0.67$) had transformation zone (TZ) 3. 45/151 (29.8%) of group A patients and 48/149 (32.2%) of group B patients underwent top-hat procedure, i.e. one superficial excision followed by one deeper removal of the endocervical tissue ($p = 0.74$). There was no difference in intra, and post-operative complications in the two groups. Positive endocervical resection margins (R0) were 9.9% in VITOM® group and 8.7% in colposcopy group, respectively. Unclear endocervical resection margins (Rx) were 2.0% in both groups. Mean total excised cervical volume was 1.20 cubic centimeter (cc³) in group A, and 1.24 cc³ in group B, respectively. Recurrent disease occurred in 2.3% of patients at 6 months follow-up.

Conclusion: Loop excision of CIN 2+ is equally effective and safe under VITOM® guidance and olposcopic assistance. In both groups sound endocervical margins were > 88%, and excised cervical volume was about 1.2 cc³. Video assisted loop excisions of CIN 2+ should be used to replace bare eye operations in Germany.

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CLINICAL RELEVANCE OF OBJECTIFYING COLPOSCOPY: THE PATHOGNOMONIC SIGNS

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Objective: To evaluate the clinical value of four objective colposcopic pathognomonic criteria inner border sign, ridge sign, cuffed crypt openings and rag sign to diagnose high-grade cervical intraepithelial neoplasia (CIN), using video exoscopy and to compare it to six subjective graduating signs.

Study Design: Prospective evaluation of video recordings of 444 patients, referred for diagnostic colposcopy, who underwent cervical biopsies, and, if indicated loop excisions, was performed. The most severe histological diagnosis was recorded. Sensitivity, specificity, positive predictive value (PPV), negative predictive value (NPV), and likelihood ratios (LR) with 95% confidence interval, for high-grade CIN were calculated.

Results: Single biopsy, two biopsies and magnification-guided loop excision were performed in 60.8%, 39.2% and 70.5% of patients, respectively. Sensitivity, specificity, PPV and NPV to detect high-grade CIN were 19.3%, 99.2%, 98.3% and 35.8%, for inner border sign; 53.1%, 93.5%, 94.7% and 47.6%, for ridge sign; 51.5%, 84.9%, 88.2%, and 44.3%, for cuffed crypt openings, and 40.7%, 96.4%, 96.1% and 42.5%, for rag sign, respectively. The positive likelihood ratio (LR+) was 26.7 and the negative likelihood ratio (LR-) was 0.81, for inner border sign; 8.2 and 0.5, for ridge sign; 3.41 and 0.57 for cuffed crypt openings; and 11.3 and 0.62 for rag sign, respectively. 90% of high-grade CIN had at least one pathognomonic sign. Combination of any two pathognomonic signs significantly increased the LR of the presence of high-grade CIN, and was clinically superior to any combination of graduating signs.

Conclusion: Pathognomonic objective colposcopic criteria, significantly associated with high-grade CIN, are clinically superior to graduating signs to diagnose high-grade CIN.

P 25

SIGNIFICANCE OF ENDO. CRYPT INVOLVEMENT BY HIGH-GRADE CERVICAL INTRAEPITHELIAL NEOPLASIA AFTER LLE

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Introduction: Since its introduction in 1988, the cervical screening programme had led to a reduction in the incidence of cervical cancer. Most high grade lesions are treated using a variety of treatment methods. Even with clear margins histologically, there is a recurrence rate post-treatment which is often difficult to predict. One possibility to assist in prediction of recurrence is consideration of those women who had crypt involvement of their CIN.

Study design: Retrospective observational controlled study

Method: Inclusion criteria - Women who had cervical cone biopsy in 2003/4 for high grade cervical intraepithelial neoplasia (HGCIN) in two London Colposcopy Units. Only those with complete excision were included. This was mostly documented as endo. And ecto. cervical margin clearance. Women who had cervical crypt involvement with CIN were compared to women with no crypt involvement. Outcomes assessed were subsequent abnormal cytology, histology and repeat treatment.

Results:

- 588 women had complete excision of their CIN on histology.
- No significant difference in age between groups with (30.2), (32) and without (29.7), (31) crypt involvement ($P < 0.25$) ($P < 0.5$) in GSH and SMH respectively.
- There was a significant difference in the prevalence of abnormal smear results after treatment in the crypt involvement group in the units (GSH $P = 0.043$) & (SMH $P = 0.066$)
- The odds ratio for repeat treatment in the crypt involvement group was similar in the two units (OR 2.67, CI 1.27–5.64, $P = 0.046$).

Conclusion: There appears to be an increased risk of recurrence of CIN in those who had complete excision of their HGCIN, when histology showed crypt involvement. It may be worth considering in future asking for lateral margin assessment as this may be positive even if ecto and endo cervical margins are clear.

It would be interesting to assess on a regional basis, whether these patients were likely to be HPV positive post-treatment or are more likely to have positive lateral margins.

P 26

CHARACTERISTICS OF PATIENTS WITH RAPID EVOLUTION CERVIX PATHOLOGY

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Objectives: To know the time between the last normal cytology and the first abnormal one in Tudela Health area (Spain) patients in which a cervical conization was finally performed. To seek for risk factors in patients in which the time passed between both cytologies had been a year or shorter.

Materials and methods: It was conducted a descriptive study about the patients that had underwent cervical conization in the last 2 years (April 2011-April 2013) in the "Reina Sofia" Hospital, Tudela, Spain. It was investigated the time passed between the last normal cytology

and the first abnormal one. In the cases where this period had been 1 year or shorter, different factors such as age, smoking, existence and type of HPV, previous HPV vaccination, use of hormonal contraceptives and final diagnosis of surgical piece were analyzed.

Results: A total of 76 patients required a cervical conization in the analyzed period, with the pre-surgical indication of persistent L-SIL or H-SIL. The 7, 9% of them had had a normal cervical cytology in the last year. Despite the screening program widely implanted in the Health Area, just the 30, 3% of the patients had undergone cervical cytology in the last 3 years and a 30,3% did not remember when had done it. Besides, just a 5, 3% of the cases (4 patients) had applied HPV vaccine.

Between the 6 patients with normal cytology in the last year, the average age was 37,33 years old (22-58), 50% smoked, 33% had used hormonal contraceptives in the last years and just one case presented both risk factors. All the cases were positive for high risk HPV. In one patient the surgery indication was persistent L-SIL and the diagnosis was confirmed. In the other 5 cases the indication was H-SIL, which was confirmed just in 2 cases (the anatomopathological study showed 2 H-SIL, 2 L-SIL and a normal cervix).

Comments: The sample size is reduced but represents the Health Area reality. Despite the wide implementation of the screening program, a great number of women did not have realized cervical cytology in the last 3 years. Maybe the large number of new immigrants in the Area could explain these results and more efforts should be done in those patients recruitment.

HPV vaccine was included in the Spanish immunization schedule 6 years ago; since this moment it has been administrated at 14 years old. In the study period just a 5,3% of woman that underwent cervical conization had been vaccinated and none of the rapid evolution cervix pathology ones.

The results show that cervical pathology screening simply based in periodicity (each 2 or 3 years) could suppose a delay in the diagnosis in at least 7,9% of the patients that need a cervical conization. Given that the only risk factor present in all patients with normal cytology in the last year was the presence of high risk HPV, it seems to be crucial the incorporation of HPV tests in all the cervical screening programs, as it is being increasingly included in worldwide protocols.

P 27

EXTRAMAMMARY PAGET'S DISEASE OF THE VULVA (EMPD) - A CASE REPORT

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Abstract: EMPD is a rare intraepithelial non-squamous neoplasia, which represents less than 1% vulvar tumors. Predominantly it affects white women between 50 and 80 years of age. EMPD occurs in cutaneous areas bearing apocrine glands - vulva, perineum, perianal area, axilla, penis, scrotum and rarely region of thighs or buttocks. It is characterized microscopically by the presence of specific tumor cells called PAGET'S CELLS - atypical large cells with pale clear cytoplasm and large round nuclei.

We report a rare case of a 62-year old female patient with Extramammary Paget disease of vulva and underlying well differentiated endometrial adenocarcinoma. On January this year the patient was referred to our department because of 9 months history of vaginal spotting, with suspect ultrasonographic view of endometrium and one year history of vulvar discomfort. The patient passed dilation and curettage and biopsy of vulvar lesion

with histopathological result of endometrial adenocarcinoma grade 1, vulvar intraepithelial neoplasia I-II with positive surgical margins and histopathological signs of EMPD. The patient was submitted to surgical treatment. Final histopathological report was: Endometrial carcinoma p T1a NX, MO, grade 1, Extramammary Paget's vulvar disease, with positive surgical margins and sporadic microinvasion into dermis 0.04mm. Vulvar EMPD lesions were improved after two months of local treatment with Cyteal solution (Chlorhexidine). Another surgical treatment of vulvar EMPD is considered (laser skinning vulvectomy).

P 28

QUALITY ASSURANCE (QA) IN COLPOSCOPY SERVICE IN LATVIA

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Objectives: A review of the potential for introduction of colposcopic QA into the Latvian Cervical Screening Programme

Background: A cervical cancer screening programme was established in Latvia in 2009 and the colposcopic part of the programme was started in June 2012. The EFC and British Society for Colposcopy and Cervical Pathology sponsored two gynaecologists from Latvia to receive hands-on colposcopic experience and to see UK colposcopy QA in practise. This was to enable RCOG/BSCCP colposcopy certification and to determine what aspects of QA could easily be introduced into the Latvian programme at this stage.

Recommendations: The Latvian Colposcopy Society and Latvian Association of Obstetricians & Gynaecologists have already formulated national guidelines that comply with European guidelines. Consensus on agreed quality standards should be obtained as soon as possible to enable and guide required data collection. The Latvian screening programme should aim to have a single colposcopy data set to enable benchmarking and quality assurance. This dataset needs to be agreed as a matter of urgency.

Internal QA should include the standardized audit and the use of regular multidisciplinary team meetings.

Conclusions: The launching of the Latvian Cervical Screening programme affords a tremendous opportunity for the introduction of a high-quality colposcopy service with an embedded QA component. This aspiration can be realistically achieved by actioning these recommendations.

P 29

DIAGNOSIS AND MANAGEMENT OF PRE-INVASIVE LESIONS OF THE CERVIX

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Cervical lesions have a major importance in carcinogenesis.

Evidence gathered concerning the natural history of preinvasive cervical lesions shows that untreated it can progress to invasive cancer in a substantial proportion.

We present a study on a sample of 126 cases of cervical lesions that were studied records

of diagnosis and treatment, cytology and colposcopy exams and who underwent surgical treatment, which consisted in excision of the transformation zone with diathermic loop-25 cases (19%), cone biopsy-90 cases (71.42%), and amputation of cervix-11 cases (8.7%).

Histopathological diagnosis of fragments extracted by cone biopsy reveal: CIN 1 48.41 %, CIN 2 38.09 % and CIN 3 13.49 %.

We noticed concordance between cytology, colposcopic examination and histopathological result.

There was a perfect concordance in 120 cases (95.24%), indicating cervical cancer in only 6 cases (4.76%).

Of these, in 5 cases (83.3%) invasive cancer was confirmed on histopathological examination of the uterus after hysterectomy, in one case (16.67%) there was a false negative result reconfirming the histopathological outcome of the cone obtained by conization.

Cone biopsy in these cases has allowed early diagnosis of cancer that would otherwise have been omitted until a later stage.

P 30 COLPOSCOPY ACCURACY AT ST MARY'S HOSPITAL

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Colposcopic Accuracy by definition is the percentage of patients with high grade histology correctly predicted as high grade on Colposcopy.

It is desirable that colposcopists should be able to differentiate high grade lesions in order to avoid missing advanced disease. A variety of factors influence the precision of colposcopic diagnosis.

Colposcopic accuracy analysis is one of the required fields for QA dataset completion.

St Mary's Hospital Colposcopy Department analyses both Unit and individual colposcopic accuracy figures on a yearly basis. It has been noted that in calculating this, a proportion of patients with high grade biopsies were found to have low grade cone biopsies. If these are excluded and colposcopic accuracy is recalculated the variance between the two figures was 2008/9 was 6%, 2009/10 was 16%.

Objectives:

- 1) Estimate the colposcopic accuracy at St Mary's hospital (a),
- 2) Then looked at those who had low grade/ neg cones and recalculated colposcopic accuracy and measure the colposcopy variance (b)
- 3) Assess contributing factors that may affect colposcopic accuracy,

Methodology: Retrospective study at St Mary's hospital, London between April 2010 and March 2011. All patients that had a high grade cervical biopsy were obtained from the Excelicare Colposcopy database. An Audit proforma was completed for each patient detailing the colposcopic impression, colposcopic and treatment outcomes as well as demographic information. Data was then transposed onto an Excel spreadsheet for analysis.

Results: 192 patients who had high grade cervical biopsy results were reviewed. 144 of these patients were correctly predicted as high grade on colposcopic examination, giving a departmental accuracy of 75%.

The recalculated accuracy after extracting the low grade cone biopsies, predicted as low grade was 78%, giving a variance of 3%. This is closer to the 2008/9 figure rather than the 2009/10 figure.

We then analysed the influence of referring cytology. 109 were referred with low grade cytology. Of these patients the colposcopic opinion was recorded as high grade in 68%. This is higher than some quoted figures from other studies. Using high grade referral cytology the colposcopic accuracy was 91.5%

Further analysis was undertaken for demographic parameters, previous history of abnormal cervical cytology/ histology and size of lesions.

Conclusions: Colposcopic accuracy is within National parameters in our Unit, but in areas where the figures are low, it may be worth considering recalculating this based on a final treatment outcome of low-grade disease.

In our Unit, grade of referring cytology does not appear to have as much influence as in other studies.

P 31 A STUDY TO INVESTIGATE THE OUTCOME OF REFERRALS WITH GLANDULAR NEOPLASIA

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Introduction: The natural history of glandular cervical neoplasia remains unclear. Current evidence suggests that women referred to colposcopy with a single cervical cytology sample reporting glandular neoplasia are associated with high levels of invasive (40-43%) and preinvasive (20-28%) disease. The BS CCP national guidelines state that all women must be referred for colposcopy after one smear test reported as possible glandular neoplasia. Furthermore, patients with suspected glandular neoplasia should be seen

Aim: To analyse the referral patterns and outcomes of women referred to St Helier's NHS Trust with atypical glandular cells on cervical study. We consider the treatment women have received in comparison to those outlined by the BS CCP.

Methods: This is a 10 year retrospective study of women who were referred to St Helier's NHS Trust Colposcopy clinic having obtained an abnormal smear suggestive of glandular neoplasia.

Results: We consider the outcomes of 56 women who have been followed up over the last ten years. This includes reviewing the smear and obstetric history, type of contraception used, any medication patients are using and whether they smoke or not. We also consider whether patients were referred within the correct timeframe to colposcopy clinic for review.

Conclusions: Initial results suggest that women are being reviewed appropriately in the colposcopy clinics, but management and long-term follow up is subject to individual variation.

P 32 COLPOSCOPY ACCURACY USING THE DYNAMIC SPECTRAL IMAGING SYSTEM (DySIS) BY COLPOSCOPIST EXPERIENCE

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Objective: To analyze the influence of colposcopist experience in the diagnosis of the cervical pathology using Dynamic Spectral Imaging System (DySIS) and conventional colposcopy.

Study Design: Fifty images of normal and abnormal cervix performed with conventional colposcopy (CC) and DySIS mapping were projected at the same time to 63 participants

(resident, general gynecologist and accredited colposcopist). Professionals were asked about the possible diagnosis (normal, minor or major changes or cancer). Participant's experience was divided into low (n=27), medium (n=18) and high (n=18) by number of colposcopies performed routinely. The CC diagnosis was correlated with DySIS diagnosis.

Results: The mean of correct diagnoses was higher in the DYSIS than in CC in the low and medium experience group (20.4 vs. 24.4, and 21.9 vs. 26.0, respectively; $p < 0.001$), but not in the high experience group (24.8 vs. 26.5, $p = 0.106$). The correct diagnosis was significantly higher in DYSIS than CC for all experience groups in cases with normal cervix and CIN2+, but not with CIN 1. There was agreement for all experience groups in consider DYSIS as better than CC to orient the biopsy site, in that offer more information and that DYS allow performing colposcopy without experience. Low and medium, but not high, experience groups were agree in consider DYSIS as easier and better to orient the diagnosis.

Conclusion: Colposcopy with DYSIS allows more hits than the CC in the diagnosis of cervical lesions, regardless of professional experience, and was considered better especially when colposcopist not skilled.

P 33

GIANT CONDYLOMA ACUMINATA OF BUSCHKE AND LÖWENSTEIN: CASE REPORT

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Objectives: We present the case of a giant condyloma acuminata (GCA) in vulvar region and we carry out a review of the literature published.

Method: We searched for «giant condyloma acuminatum»; «Buschke-Loewenstein tumor»; «treatment of giant condyloma acuminatum of the perianal region» at PubMed. Original articles and reviews were selected, focusing in those in which management and treatment were discussed.

Case report: A 17-year-old girl, with no significant medical history presents with a giant painful vulvar mass, rapid-growing, which had afflicted her for at least 3 months.

Physical exam revealed a fungating, cauliflower-like mass of 4x4cm with broad base of implantation located in left labia majora; and inguinal adenopathy associated.

Hystological exam was concordant with CGA and positive for HPV 16 and 18. A wide excision was performed, with a 10mm security margin. Pathological exam confirmed diagnosis, with no evidence of dysplasia or malignant transformation.

Postoperative course was uneventful, and no signs of relapse have been detected after a year follow up.

Conclusions: Buschke-Löwenstein represents a therapeutic challenge, which difficulty lies in high recurrence rate (33-70%) and the possibility of malignant transformation into a squamous cell carcinoma (30-52%).

No absolutely satisfactory management has been described up to day, being a wide range of opinions in literature about the most suitable treatment

P 34

VULVAR, VAGINAL AND CERVICAL SCREENING IN IMMUNOSUPRESSED PATIENTS

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Objectives: Assess the incidence and risk factors of vulvar, vaginal and cervical disease in immunosuppressed patients. Analyze the short-term screening protocol implementation and follow up

Methods: Cross-sectional Study. Application of screening protocol in immunosuppressed patients in the unit of Cervical Pathology and Colposcopy at our center

Results: We studied 68 patients. The mean age was 43.58 +/- 9.71 years (18-63). In 71.64% (48) the cause of immunosuppression was HIV infection, 17.91% (12) autoimmune disease, 8.95% (6) secondary immunosuppression due to organ transplantation and 2.98% (2) other causes. The average time of immunosuppression was 9.88 +/- 8.45 years (0.5-30)

Associated risks factors:

- 58.21% (40) of the patients smoked or had smoked while 41.79% (27) did not.
- 92.53% (63) of the patients had a history of taking contraceptives.
- None of the patients had received HPV vaccination.
- HPV detection was performed in 61.76% (42). Of these, 64.28% (27) introduced HR HPV positivity
- The mean age of onset of sexual relations was 17.28 +/- 2.24 (12-25) years. The mean number of sexual partners in the past three years was 0.95 +/- 3.39 (0-3).
- 81.53% (55) of the patients denied practicing anal intercourse, while 18.46% (12) recognized sporadic practice. 31.25% (21) of patients routinely practiced oral intercourse, while 35.93% (24) did it sporadically

CERVICAL DISEASE:

- Only 67.64% (46) had successful screening protocols for cervical pathology
- 72.72% (24) had abnormal cytology and histology. Of these, 87.5% (21) had positive HR-HPV.
- We diagnosed cervical disease in 48.52% (33). Of these, 63.63% (21) had diagnosis of CIN 2 + (42.42% (14) CIN 2, 21.21% (7) CIN 3) and 18.18% (6) CIN 1. 18.18% (11) patients showed abnormal cytological remaining (ASC-Us, LSIL, HSIL or ASC-H) without associated histological lesions.
- Excisional treatment was performed in 100% of cases of CIN2 + (71.42% with cervical conization and hysterectomy 28.57%).
- Anal cytology was performed in 100% of these patients. The 6.06% (2) were diagnosed with ASC-Us.

VAGINAL DISEASE

1 case of VAIN 3 (1.47%)

VULVAR DISEASE

- We detected 22.05% (15) cases of vulvar pathology. 33.33% (5) with some degree of VIN, while 66.67% (10) were warts.
- Surgical treatment was performed in all cases of VIN, and 10% of cases of condyloma, were treated with 90% topic Imiquimod.

Conclusion: Immunosuppression status is associated with increased risk of HR HPV infection and, consequently, increased risk of having abnormal cytologic lesion in the vulva,

vagina and cervix, as well as increased risk of progression to malignant forms. In our study, 48% of patients had a cytological alteration, corresponding 63% of them to CIN2+, which required excisional treatment.

P 35
EVALUATION OF A SCREENING PROGRAM OF ANAL PAPILOMAVIRUS RELATED DISEASE

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Methods: From May 2011 to December 2012, 122 high risk patients were included. The inclusion criteria were:

- HIV infection
- immunocompromised from other etiologies
- Anal condiloma
- History of cervical, vulvar o vaginal high grade intraepithelial lesions
- History of persistent high -risk HPV DNA serotypes

Results:

- Patients mean age was 42,07 years.
- The most frequent indication for screening was Immunosuppression (63,3%) and the most frequent cause of Immunosuppression was HIV infection (84,2%)
- Regarding risk factors:
- 40,2% were smokers (median rate 20 cigarretes/day)
- Anticonception was used only by 9% of patients
- Median age for first sexual relation was 18,01 years
- 61,7% of patients denied anal intercourse as sexual practice. 12,3% had it usually and 21,3% performed it esporadically
- 63,9% had previous cervical disease. Of these 52,6% had a diagnose of CIN 3
- 21,3% had previous vulvar disease. Of these, 57,7% had condyloma.
- Only 8,2% had anal condylomas.
- 52 patients (42,6%) had any HPV DNA serotype in lower genital tract. In the cases were HPV was identified, 41 (78,8%) were high risk serotypes, being the most frequent HPV 16 (31,7%) and 31 (13,05%).
- Anal citology results were:
- ASCUS in 8 patients (6,65)
- ASC-H in 1 patient (0,8%)
- LSIL in 5 patients (4,1%)
- HSIL in 2 patients (1,6%)

All All16 patients underwent high resolution anoscopy with no pathological findings.

Conclusions: Launched anal pathology screening protocol, the data associated with the current literature; suggest a rise in HPV-dependent tumors, especially in young patients, making it important to these studies to provide comprehensive care to our patients in the context of a multidisciplinary global protocol HPV injury prevention in different locations.

P 36
VALUE OF COLPOSCOPY IN DETECTING LGSIL IN POPULATION WITH HIGH PREVALENCE OF CERVICAL CANCER

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Background: The incidence of cervical cancer in Serbia is twice as high as in western European countries.

Aim: Our aim was to show value of colposcopy in detecting LGSIL, because of intensive monitoring. Colposcopy is used in addition to cervical cytology as a routine screening method for cervical cancer given high prevalence of disease, limited resources (lack of ability to perform HPV HR screening) and large number of poorly compliant patients.

Materials and Methods: This was retrospective study evaluating 728 patients with LGSIL between January 2010 and January 2013. After application of acetic acid and overcoating Lugol's solution we made targeted biopsy observed by colposcopy regardless of the pap smear. We compared the results of conventional pap smear for each colposcopic images individually and in relation to age.

Results: The age of patients was from 18 to 72, most of them between 21 to 40 years, 523 (71,8%). Frequently verified image is mosaic pattern, 39,6%, two or more patologic images has 24, 5, AWepithel 11,9%, atypical REE 11,2%, leucoplakia 7,2%, punctatio 3,2% and ectopio 2,4%. Mosaic images shows high sensitivity 65,4% in accordance with the relationship LGSIL with HPV infection. Normal pap smear was reported in 451 patients (61,9%) while 277 (38,11%) had some degree of cytological abnormality. Pap smear in patients younger then 40 years show low specificity 23,8%, but high negative predictive value. Patients over 40 has PPV of pap smear.

Conclusion: LGSIL changes has easily evaluation and often regress spontaneously. In our population with such high incidence Ca PVU, is necessary to extract population with these lesion for more intensive monitoring. These circumstances warrant that in this terms colposcopy is very useful tool to guide to decrease such high incidence of cervical cancer in Serbia.

P 37
DETECTION OF E6/E7-ARNM IS BETTER THAN ADN-HPV DETECTION: OUR EXPERIENCE

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E6 and E7 proteins produced by high-risk HPV have an essential role in carcinogenesis. Detection of mARN for these proteins shows direct viral activity and corresponds to initiation and maintaining of pre-cancerous activity. Studies have suggested that detection of high-risk E6/E7 mRNA may be a better indicator of disease progression than DNA detection. Carcinogenic HPV E6/E7 mRNA may achieve similar clinical sensitivity and

Negative Predictive Value (NPV) as carcinogenic HPV DNA, while possibly achieving better clinical specificity and Positive Predictive Value (PPV).

We present our one-year experience using APTIMA® HPV Assay, a method approved by the FDA in 2011. The method used is nucleic acid sequence based amplification (NASBA), which identifies the E6/E7 proteins and not HPV virions like the DNA detection.

We achieved better clinical staging of the dysplasia and reduced the number of cases that were previously referred to colposcopy.

P 38

INCREASED RISK OF PRETERM BIRTH AFTER CIN TREATMENT: PILOT DATA ON POSSIBLE MECHANISM

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Background: We hypothesise that the amount of tissue removed during treatment is likely to influence healing, the effect on the host defence mechanisms and the complex interplay between microflora and its surroundings. It may also be that cervical precancer itself or even genuine variations amongst individuals conversely influence the risk of PTB.

Objectives/ We aim to:

- 1) determine with imaging whether the amount of tissue removed significantly alters the cervical structure/composition 6 months post-treatment
- 2) assess the impact of treatment and the presence of cervical precancer on the immune defences
- 3) explore the impact of changes in the immune responses on the normal vaginal microflora and surroundings

Material & Methods: Design: Prospective observational study. **Setting:** Imperial College – University Hospital of Ioannina. **Period:** May 2013 onwards. **Population:** Study: Women planned to undergo excisional treatment for CIN who wish to have future pregnancies – Control: Women with CIN not requiring treatment and women without CIN. **Interventions:** The cervical volume (and dimensions) was calculated 3-dimensional transvaginal ultrasound (3D-TVS) and/or 2D-TVS before treatment. The volume (and dimensions) of the cone was assessed before fixation by a volumetric tube and a ruler; the percentage (%) of excision was computed. Cervical regeneration was estimated by repeat 3D-TVS and/or 2D-TVS at 6 months.

Cervicovaginal secretion samples were obtained for assessment of the antimicrobial peptides (ELISA), the leucocytes subpopulations (flow cytometry), the vaginal microbiome through bacterial DNA pyrosequencing and the metabonomic profile. We studied differences amongst women with cervical precancer, normal individuals and women before and after treatment in order to assess how these differ and how they may influence the risk of prematurity and cervical carcinogenesis.

Results: A total of 48 women have been recruited; these include 24 treatments, 12 women with CIN and 10 without abnormalities. Results on the follow-up visit after treatment are awaited. Both the total cervical volume before treatment and the volume of the excised cone varied substantially. The estimated proportion of excision varied significantly

between 4.2% and 39% (median 19%). Pilot experimental data on the antimicrobial peptides concentration, the leucocytes subpopulations and the vaginal microbiome amongst the comparison groups will be presented.

Conclusions: A better understanding of the underlying mechanisms may enable prevention of preterm birth within that population with cause-directed strategies, and may facilitate the development of diagnostic and prognostic tools. In addition, it is likely that these experiments may give further information on differences amongst individuals that affect the risk of HPV persistence.

P 39

THE ROLE OF LOCAL TREATMENT WITH HYALURONIC ACID AFTER PROCEDURES FOR CIN

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Aim of the study: The aim of the study was to evaluate the efficacy of vaginal application of hyaluronic acid (Feminella Hyalosoft) in healing and repairing process after cervical procedures performed for the diagnosis or treatment of cervical intraepithelial neoplasia.

Methods: The examined group consisted of 114 women with cervical abnormalities on Papanicolaou smears (ASCUS, ASC-H, LSIL, HSIL) and colposcopically suspected cervical lesions at whom we performed cervical interventions: punch biopsy, LEEP, conization. The patients were divided in two groups: first one, represented by 65 patients who underwent local treatment with hyaluronic acid, while the second one, the control group, was represented by 49 women who were followed up without any local treatment. The effect of treatment was estimated consecutively at 6 weeks and at 4 months by visual inspection of the cervix and vagina. We also analyzed the subjective opinions of the patients related to sexual intercourse.

Results: In the first group, compared to the control one, the application of hyaluronic acid favoured the reparation of cervix more often. After cervical procedures such as LEEP or cone biopsy – the repairing process was fulfilled in the two groups as follows: after 6 weeks 93% vs 70%; after 4 months 98% vs 89%. There was no difference between patients in the groups who had punch biopsies regarding the healing process. We also found a difference in relief of dyspareunia in the two groups: respectively after 6 weeks 54% vs 10%; after 4 months 57% vs 8%.

Conclusion: Hyaluronic acid (Feminella Hyalosoft) aids the healing process of post-procedural wounds in the uterine cervix. The favorable results are more often observed after procedure as LEEP or cone biopsy. We observe no benefits of hyaluronic acid in cases of punch biopsy.

P 40

SYMPTOMATIC PRESENTATION OF CERVICAL CANCER

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Background: Cervical cancer is largely viewed as a preventable disease due to the success of the NHS cervical screening programme (NHSCSP) however, the number of cases over

recent years in the UK has been increasing. It has been proposed that a systemic analysis of cases is performed to identify trends and common failings in order to identify women who are not being diagnosed through the screening programme and to identify opportunities where patient engagement could have occurred at an earlier opportunity.

Methods: All cervical cancer cases diagnosed between 2007 and 2009 at the University Hospitals of Leicester were reviewed.

Results: In total, 115 cases were reviewed. Median age at diagnosis was 43 years (range 20–88 years) and 53% were stage 1 at diagnosis. Of the 85 women eligible for screening (25–64 years) only 44.9% were compliant. 41/85 women presented symptomatically (39% post coital bleeding, 17% intermenstrual bleeding, 32% postmenopausal bleeding, 7% vaginal discharge). All women who were asymptomatic at diagnosis were stage 1 at diagnosis compared to only 45% in the symptomatic group, $p < 0.0001$. The majority of symptomatic women presented initially at a colposcopy (61%) or gynaecology (27%) clinic, however, 3 women presented to the emergency department and 1 to the general surgeons. Women who presented symptomatically were significantly older compared to those who were asymptomatic, median age at diagnosis 55 years versus 37 years, $p < 0.0001$. There was no significant difference in the age at diagnosis, ethnicity or symptoms between women who presented within 3 months of becoming symptomatic as compared to women who delayed presentation.

Conclusions: In depth review of all cervical cancers can help to identify areas of the screening programme and the referral pathway where improvements can be made. Doctors working in all medical specialties should be aware of the symptoms associated with cervical cancer since women may present to non-gynaecologists, which could potentially result in a delay in diagnosis.

P 41 CONE BIOPSIES SHOWING CIN1 OR LESS AFTER HIGH GRADE CERVICAL PUNCH BIOPSY

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Background: Between 10–39% of cervical cone biopsy specimens do not show premalignant or malignant glandular or squamous cell types ^(1,2). This is concerning in terms of clinical management.

The possible explanation for a negative cone biopsy includes the following:

- 1) Regression of index lesion in the interval between biopsy and subsequent treatment.
- 2) Complete excision at the time of biopsy.
- 3) Artifactual alteration of the cone specimen resulting in distortion of the epithelium from laser/ diathermy-related thermal injury.
- 4) The index lesion remain in paraffin block of tissue and is not detected in the first section cut.
- 5) False negative cone biopsy results
- 6) False positive punch biopsy result

Aim of the study is to Audit the following:

- (a) How many of all high grade punch biopsies have \leq low grade histology on cone biopsy (as a percentage of final outcome of cervical treatment following high grade cervical punch biopsies)?
- (b) Analyse factors including age, smoking, transformation zone type, referring cytology,

size of lesion etc that could have suggested that a low grade cone biopsy would have resulted after the high grade punch biopsy.

These factors will be compared with those undergoing LETZ, with an outcome of high grade histology on cone biopsy.

(c) If there are factors that would lead to a more conservative management, then potentially this could decrease risk of premature delivery in future and allow spontaneous resolution of disease.

(d) Were these cases reviewed at Colposcopy MDT and what were the conclusions?

Methodology: Retrospective analysis of all patients who underwent cervical treatment following a high grade punch biopsy with an outcome of low grade cone biopsy for 5 year – period from October 2006 until September 2011. We obtained a CONTROL group for these patients – next high grade cone biopsy following high grade punch biopsy.

Results: 1151 cervical biopsies showed high grade disease. 216 cone biopsies–LG on cone biopsy following HG on punch biopsy. 17% patients–HG biopsies treated, had LG cone biopsy. 555 cone biopsies showing \leq CIN 1 on cone biopsy during that period. 38% LG cone had a prior HG biopsy. Age and smoking does not appear to be statistically significant factors (using both Univariate and Multivariate analysis). Two factors which are statistically significant are Colposcopy impression and Referral cytology

Conclusion: Audit of LG cone biopsies following HG punch biopsies is essential for Quality Control in Colposcopy and Histopathology

Referral cytology suggestive of a **LG abnormality** and **Colposcopic impression** indicating a **low grade abnormality** ($p < 0.05$) were statistically significant factors

Need further statistical analysis of possible combination(s) of factors that may predict LG cone biopsy outcomes following HG punch biopsies.

P 42 14 YEARS REVIEW OF VAIN (VAGINAL INTRAEPITHELIAL NEOPLASIA)

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Introduction: Vaginal intraepithelial neoplasia (VAIN) is an uncommon finding in patients undergoing colposcopic assessment. It accounts for 0.4% of lower genital tract disease. It is estimated that 1–6% of patients with CIN have coexistent VAIN. It is commoner in immuno-suppressed patients. CIN and VAIN share a common aetiology. HPV virus is present in both cervical and vaginal lesions. VAIN is now more recognised because of increased awareness and probably better colposcopic training.

Histological assessment is analogous to CIN and graded VAIN 1, 2, and 3.

Objective:

The aim was to review all cases of VAIN at St Mary's hospital from 1999 –2012 to:

- a) Assess if there was increase in diagnosis of VAIN,
- b) To examine all VAIN patients with VAIN, especially looking at treatment modalities and recurrence/ persistence.
- c) To examine all patients with previous hysterectomy

Methods: Histology results obtained for all vaginal biopsies and we studied all patients with VAIN. The patient electronic records were interrogated, an audit proforma was completed, results anonymised and data analysed.

Results: 94 patients were diagnosed with VAIN over 14 years.

An increase in incidence of VAIN was seen from 3 patients in 1999 to 9 patients in 2012. The largest number of patients in a year was diagnosed in 2009 – 16.

97% had history of multicentric disease (CIN /VIN/AIN)

20% of patients VAIN discovered incidentally during colposcopy examination

75% high grade VAIN patients were immunosuppressed, these patients exhibited multifocal disease.

10 patients with previous hysterectomy – 3 patients had hysterectomy for non-CIN reasons.

Different modalities of treatment had been used to treat patients with VAIN, varying from observation for those with biopsy proven VAIN 1, to ablative and excisional treatments.

2 patients had vaginal cancer; one previously had a Wertheim's hysterectomy for Stage 1b1 carcinoma of cervix, 11 years before.

Conclusion: The incidence of VAIN appears is increasing, although this may be due to better diagnosis.

Most high grade VAIN patients were immunosuppressed and a suggestion would be to offer HIV testing to appropriate patients.

VAIN can appear many years after CIN.

A variety of treatment methods were used. There appears to be a high incidence of persistence/ recurrence in these patients (31%).

P 43

THE COINCIDENCE OF CYTOLOGY AND HISTOLOGY IN THE PREMALIGNANT AND MALIGNANT CHANGES OF THE CERVIX

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Introduction: Cervical cancer is second the most common cancer and the fourth cancer in relation to of mortality in women. The incidence of cervical cancer in Serbia is 20,9/100,000 women/year, and Serbia is among the countries with very high risk of cervical cancer.

The aim of study: The aim is to establish the reliability of cytological diagnosis based on comparative analysis of cytological findings indicating cellular atypia and histopathologic findings of biopsy samples taken from the same patient.

Material and methods: The cytological findings were detected from 2397 samples that were processed and analyzed at the Institute of Pathology, Faculty of Medicine in Pristina – Kosovska Mitrovica.

Results: In 81 cases (3.38%) we found the presence of atypical cells and for 43 patients after that we got biopsy samples. In eight cases (18.60%) there was no matching HP and cytological diagnosis, which is statistically significant (T.prop. = 2667, p<0.05).

Conclusion: Cytodiagnosics is extremely important screening method with significant precision may indicate the cellular atypia of the epithelium of the cervix and thus contribute to the diagnosis of premalignant and malignant changes which still need to confirm by the biopsy.

P 44

CIN AND VAIN IN DIDELPHYS

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49 years old lady, P3, Didelphys uterus with two cervices had cervical smear and cervical Biopsies; which, showed border line smear to CIN changes, and also VAIN changes in vaginal skin between two cervices.

It was a unique case as difficult to visualize transformation zone especially on Right cervix and with wide spread VAIN and CIN changes.

Treatment option was a challenge as excisional treatment discussed was LLETZ, knife cone biopsy and Hysterectomy.

Patient had TLH + BSO and Histopathology showed CIN11 to CIN111.

P 45

CIN AND VAIN IN UTERINE DIDELPHYS - TREATED WITH TOTAL LAPAROSCOPIC HYSTERECTOMY: FIRST REPORTED CASE

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Background: Among 6.7% of the female population who have a uterine malformation, Uterus didelphys(UD) accounts for 8.4%. This is due to maldevelopment of Müllerian duct system. UD is commonly associated with structural abnormalities like renal agenesis (> 80%), due to limited studies it is not known the exact incidence of CIN changes or cervical cancer associated with UD. To our knowledge, we report the first case in the literature of using Total Laparoscopic Hysterectomy (TLH) to treat concurrent CIN and VAIN involving UD.

Materials/ methods: We searched Cochrane Library, UpToDate, MEDLINE, EMBASE, PubMed, TRIP, reviewed 28 articles. The evidence is of low quality as majority are retrospective studies and case reports.

Case: A 44 year old patient, para 3, with previously diagnosed UD and right-sided renal agenesis had reported abnormal smears and CIN changes on colposcopic examination of both cervices. Vaginal intraepithelial Neoplasia(VAIN) changes between the cervices was also evident. The patient underwent total laparoscopic hysterectomy (TLH) with conservation of ovaries. The ureters were identified and stented to avoid injury. The patient made a complete recovery.

Conclusion: Uterine anomalies compound diagnostic difficulty of routine pathology. Thorough examination and evaluation are crucial for timely diagnosis and treatment. Gynaecologists must be aware that although genital tract duplications are rare, should always be considered. There has been reported cases laparoscopic hemihysterectomy, subtotal hysterectomy, morcellation of UD. We failed to find any TLH before our case. The laparoscopic approach for hysterectomy involving UD is uncommon and created a challenging procedure, though was success. The method should be considered by experienced laparoscopic surgeons for future UD hysterectomy cases. There have been reported incidences of CIN and invasive cervical cancer in UD before. Our case only reports concurrent CIN and VAIN in UD. Also out of 53 cases reported, only two including our case, had both cervices were dysplastic.

P 46 THE IMPACT OF ANXIETY FROM CANCER ON ATTENDANCE TO COLPOSCOPY SERVICES

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The impact of anxiety from cancer on attendance to colposcopy services. Analysis of celebrity death from cervical cancer on cervical screening.

Introduction; This is in depth statistical analysis of the impact on the workload in the cytopathology and colposcopy and where the increase came from and the improved pick up rate of pre cancers and cancers. In summary it is a retrospective case controlled cohort study comparing 9 months' workload in cytology and colposcopy at Portsmouth Hospitals NHS Trust after the announcement of Television celebrity's diagnosis of cervical cancer and her death with the workload of the same period a year previously.

Methods; data collection through colposcopy and pathology logs and results with comparing the attendance rate in two groups one 9 months period before the death and the other is 9 months following the event. Other parameters compared are the age, sex, ultimate diagnosis, type of cancers

Results; There was a 10.6% increase in the number of cervical specimens received over the nine months following the announcement (41843 vs. 37838). The number of women referred on to colposcopy increased (1270 vs. 775). There was 50% increase in cancers diagnosed (21 vs. 14). There are fewer defaulters (OR 0.23). ($P < 0.0001$).

Conclusion; the impact of the celebrity's death impact has led to increased attendance in the screening program leading to more early cancers being identified.

P 47 CASE OF RECTAL TUMOR METASTASIS TO THE CERVIX

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This is a case of 55 menopausal lady who presented with continuous postmenopausal bleeding. This has been ignored for 6 months. She has previous history of recto sigmoid colectomy for bowel cancer that was followed by chemotherapy and radiotherapy. She defaulted her smears recall for more than 20 years. Examination in the rapid access clinic was difficult as the vagina has been affected by the radiation. Transvaginal scan indicated a well defined echobright 3cm by 2cm mass in the cervix with indistinct endometrium. She had cross sectional imaging then examination under anaesthesia. Under anaesthesia the cervix was biopsied and that confirmed metastasis from the rectal cancer. The cancer team meeting recommended palliative approach.

The cervix can be the site of cancer from other organs. Most commonly the endometrium and to a less extent is from the other part of the genital tract, like ovary or the tube. Cancers cells can be picked in the routine smears but screening program is set to detect precancer of the cervix. Generally speaking defaulter from routine smears invitations have higher incidences of cancer. Also opportunistic smears, those done outside the routine call intervals are associated with cancers. Scanning of the cervix when suspecting cancer is increasingly valuable investigation tool.

P 48 MULTIDISCIPLINARY MEETINGS: A REFLECTION OF OUTCOMES

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Multidisciplinary meetings are mandatory according to BSCCP standards in the UK. At St Helier's Hospital, our multidisciplinary meetings consists of colposcopists, nurses, histopathologists and cytologists. Here we review the indications and outcomes of over 30 multidisciplinary team meetings held over 6 months.

P 49 COLPOSCOPY ON-LINE QUALITY ASSURANCE PROGRAMME IN ORGANIZED SCREENING

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Objective: To present the methods and results of a web-based colposcopy quality assurance programme from a population-based cervical screening service in the Emilia-Romagna Region of northern Italy.

Methods: In 2010-2011, a web application was made accessible on the website of the regional Administration. Fifty-nine colposcopists out of the registered 65 participated. They logged-in, viewed a posted set of 50 high-quality digital colposcopic photographs selected by an expert Committee, and classified them for colposcopic impression (IFCPC 2002). Kappa coefficients for intercolposcopist agreement and colposcopist-Committee agreement were calculated.

Results: Colposcopist-Committee agreement was greater than intercolposcopist agreement (overall kappa 0.69 versus 0.60, $p < .001$). Kappa for colposcopist-Committee agreement was 0.83 on normal colposcopic findings (NCF), 0.53 on abnormal colposcopic findings (ACF)-minor changes, 0.66 on ACF-major changes, and 0.80 on invasive cancer (all p values for pairwise comparisons $< .001$, except for NCF versus cancer [$p = .078$]). There was no systematic tendency for colposcopists to under- or overestimate the colposcopic findings (two-tailed sign test, $p = .13$). Overall colposcopist-Committee agreement was greater among patients aged ≥ 35 years ($p < .001$) and for colposcopists with previous quality assurance experiences ($p < .01$). Only 0.2% impressions of NCF were formulated for a CIN2 or greater. Specularly, the impression of invasive cancer predicted CIN2 or less in 0.5% cases. The histological substrates of ACF-minor changes were dispersed over a large spectrum.

Conclusions: The reproducibility of the IFCPC 2002 classification, when used by trained colposcopists examining high-quality images, is higher than is generally perceived. ACF-minor changes is the least consistent impression.

P 50**SEEING IS BELIEVING: A REVIEW OF SEE AND TREAT****S. Datta, R. Chandra, P. Athanasias, C. Croucher, N. McWhinney**

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Seeing is believing: A review of See and treat

The BSCCP states that 90% of histology must indicated high grade CIN or cGIN for women treated at their first appointment. This retrospective study over one year considers direct referrals to colposcopy with moderate or severe cytology results. We consider the number of LLETZ histology with a high grade CIN or more, together with the post-LLETZ cytology at 6 months.

P 51**HPV TYPE DETECTION: COMPARISON OF TWO ASSAYS****M.T. Sandri, F. Bottari, C. Gulmini, A. Tricca, S. Boveri, E. Tomas-Roldan, M. Sideri**

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Background: The BD Onclarity™ HPV Assay is an amplified DNA test for qualitative detection of high-risk types of human papillomavirus (HPV). This assay is performed with the BD Viper™ LT System: the assay is able to detect and genotype all high risk HPV types (16,18, 33, 45, 59, 31, 35, 39, 51, 52, 56, 58, 66, 68). Linear Array (LA; Roche, Pleasanton, CA) is widely used system for HPV typing. While Onclarity™ HPV Assay amplifies a sequence in the E6/E7 region, Linear array is directed to amplify a segment in the L1 DNA region. Aims of this study was to compare the results of the two typing systems in a colposcopy referral population.

Methods: The BD Viper LT System, is capable of automated extraction of nucleic acids from HPV specimens as well as amplification and detection of target nucleic acid sequences by Polymerase Chain Reaction (PCR) technology. This test is a qualitative in vitro test for the detection of Human Papilloma Virus in clinical specimens and detects thirty seven anogenital HPV DNA genotypes in cervical cells collected in PreservCyt Solution. A preliminary analysis was performed on 547 cases, referred to the colposcopy clinic.

Results and Conclusions: The two tests gave concordant results in 519/547 cases (94.9%). Positive percent agreement was 93.3% and negative percent agreement was 96.2%. The vast majority of the discordant samples contained multiple HPV types. These results show a quite good comparability of the two systems, also considering that two different regions of the HPV genome are targeted, and that it may be particularly difficult to characterize patients with multiple HPV infections.

P 52**HPV DNA, MRNA AND p16^{INK4A}/KI-67 PROTEIN CO-EXPRESSION IN MINOR CERVICAL ABNORMALITIES****C. White^{1,2}, C. Ruttle², L. Pilkington², H. Keegan^{1,2}, S. O'Toole¹, C. Spillane^{1,2}, L. Sharp³, R. O'Kelly², G. Flannelly⁴, J.J. O'Leary^{1,2}, C.M. Martin^{1,2}**

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Background: The management of minor cytological abnormalities remains problematic, due to the high prevalence of transient HPV infections in low-grade disease HPV DNA triage

is limited. The use of HPV E6/E7 mRNA detection and biomarkers such as p16^{INK4A} and Ki-67 has potential to identify clinically significant infections improving diagnostic specificity.

Methods: Cervical smears for HPV testing and immunocytochemical analysis were collected from 1079 women presenting with LSIL/ASCUS at their first visit to colposcopy at the National Maternity Hospital, Dublin. HPV DNA was detected by Hybrid Capture II (Qiagen, UK), HPV E6/E7 mRNA expression by the PreTect™ HPV Proofer (NorChip AS, Norway). In those with adequate sample material remaining (n=471) p16^{INK4A}/Ki-67 expression was assessed using CINTec PLUS (Roche). The sensitivity and specificity for detection of CIN 2+ was calculated for each test.

Results: Findings indicated that HPV E6/E7 and p16^{INK4A}/Ki-67 expression offered a high specificity for detection of CIN 2+ (69.2% and 83.2%) compared to HPV DNA testing (46.7%), while HPV DNA testing yielded a higher sensitivity (91.5%). By combining the strengths of each test it was establish that merging HPV DNA testing with p16^{INK4A}/Ki-67 offered the most efficient approach for stratifying women presenting with minor cytological abnormalities at true risk of high grade pre-cancer.

Conclusion: An approach of combined HPV DNA and p16^{INK4A}/Ki-67 testing has potential to reduce colposcopy referrals.

NOTES

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Prof. Karl Ulrich Petry, Department of Obstetrics & Gynecology,
Klinikum Wolfsburg, Germany

Treatment Follow Up After Conization: the Clinical Utility of Genotyping for Risk Stratification and Management Decisions

Dr Mario Sideri, Preventive Gynecology Unit,
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