Report:
National CVD Prevention Coordinators (NCPC) Workshop

ESC Preventive Cardiology 2023
Malaga, Spain

13 April 2023
Agenda

12:45 – 12:55  Welcome & Objectives of the workshop  E Cavarretta

12:55 – 14.10  The patient journey:

  • 2 case presentations- 5 minutes each  I Kulcsar / P Jankowski
  • Discussion in groups (diagnosis, treatment, rehabilitation & long-term follow-up) - 30 minutes all
  • Comparison of management and outcome between CV risk category countries - 35 minutes all

14:10 – 14:15  Closing remarks  E Cavarretta
Chair & Speakers

- **Elena Cavarretta**, Prevention Implementation Committee Chair
- **Iulia Kulcsar**, NCPCs network Advisor & NCPC representative
- **Piotr Jankowski**, NCPCs network Advisor & NCPC representative
Participants

21 National Coordinators and Representatives from 4 European risk regions:

Low Risk: 5 participants

Moderate Risk: 4 participants

High Risk: 4 participants

Very-high Risk: 8 participants
Objective

Elena Cavarretta presented the objective of the workshop:

• Presentation of 2 patient cases:
  • 1 Secondary Prevention case (Iulia Kulcsar)
  • 1 Primary Prevention case (Piotr Jankowski)

• Discussion in groups by risk region

• Presentation of the outcome of each group

➢ Comparison of patient management between the different risk category countries.
SECONDARY PREVENTION POST TAVI

IULIA KULCSAR, MD, SENIOR CARDIOLOGIST, PhD, MASTER, FESC

13 APR 2023
Patient P.C., 71 ani, ♂

Reason for admission:
- Initiation of the CV rehabilitation – phase II after TAVI

Familial history Antecedente:
- Both parents deceased - STROKE
- 1 brother early deceased by Hodgkin’s lymphoma

BEHAVIOR
- Past smoker (40 PA), abstinent for 5 years
- Alcohol - occasional consumption

Life condition:
- Retired
Personal pathological antecedents

2011
- Complicated gastric ulcer with upper digestive hemorrhage (melena)

2014
- Chronic Lymphocytic leukemia stage I-II RAI, hypercellular form (del 17p)
- Beta-thalassemia

2020
- Severe aortic stenosis
- HF class II NYHA
- PAH - moderate
- HA grade 1 - Very high Risk
- Hyperlipoproteinemia
- Altered glucose tolerance
- Prostate Adenoma

2022
- Paroxismal AF
- TAVI – transfemoral approach - DEC.2022
Clinical + paraclinical data-admission:

• Weight=70 Kg, H=169 cm, BMI=24,5 Kg/m2;

• Patient hemodynamically stable hemodynamic BP=130/70 mmHg, average HR=60/min, AF; Preserved EF

• Axillary adenopathy -1,5 cm diameter and inguinal adenopathy- 1-2 cm diameter, painless, mobile on the superficial and deep planes, without inflammatory;

• Biological: INR: 2,05. (Treatment: Acenocumarol alternative 3mg/2mg; Clopidogrel 75mg/day, Bisoprolol 2,5mg/day, Atorvastatine 20 mg/day).
**Biochimic:**

Erythrocytes: 4 mil  
Hb: 8,8 g/dl (9,7mg/dl)  
Ht: 28,6 % (29,9%)  
MCV: 68/fL  
MCH: 21,1 pg  
MCHC: 31g/dl  
Serum iron : 54,5 gr/%  
Leukocyte: 14,800/mm³  
Neutrofile: 7,3%  
Lymphocites: 82,3%  
Monocites: 6,2%  
Eusinophile: 0,3%  
Basophilis: 3,9%  
Platlets: 291.000-mm³  
Glucose : 117mg/dl  
HbA1c: 6,14  

Col: 145 mg/dl  
LDL: 90 mg/dl  
TG: 59 mg/dl  
HDL: 33 mg/dl  
Urea: 35 mg/dl  
Uric acid : 4,86 mg/dl  
Creatinine: 1,33 mg/dl  
TGO: 17 UI  
TGP: 18 UI  
GGT: 44 UI  
eGFR: 53 ml/min/1,73m²
STAGE DIAGNOSTIC:

1. CARDIAC REHABILITATION PROGRAM
2. TAVI – TRANSPHEMURALAPROACH-2022
3. AF PERSISTENT
4. HFpEF CLASS II NYHA
5. LEFT ANTERIOR HEMIBLOCK
6. RBB
7. Chronic Lymphocytic leukemia stage I-II RAI
8. IRON DEFICIENCY ANEMIA
9. EPISTAXIS
10. CKD STD. III A
11. Complicated gastric ulcer (2011)
12. BETA TALASSEMIE
RESULTS:

- **Maximum level of effort:** 68 W = 45% from the maximum predicted value; the test was stopped at the pt. request (Borg=16);
- **Oxygen consumption** - max. 1039 ml/min (57% from the predicted value); value of O2 consumption/Kg: 15,2 ml/Kg/min *(weight=70 Kg, H=169 cm, BMI=24,5 Kg/m2) = moderate functional alteration - C Weber class;
- Anaerobic threshold: not been reached;

CONCLUSIONS: Exertional Cardiopulmonary test show a reduction of functional capacity (class C Weber); the anaerobic threshold was not reached.
AFTER 3 MONTHS- RESULTS:

- Maximum level of effort: 108 W=48% from the maximum predicted value; the test was stopped at the pt. request (Borg=15);
- Oxygen consumption - max. 1915 ml/min (68% from the predicted value); - B Weber class;
- Anaerobic threshold: - B Weber class;

CONCLUSIONS: Exertional Cardiopulmonary test show a reduction moderate-light of functional capacity (class B Weber); it is recommended as target exertional HR-95/min, 3,2 METS for aerobic exercise.
QUESTIONS

1. IS THIS PATIENT A FRAIL PT.? 
2. WHAT ARE THE SPECIFIC TARGETS OF THE REHABILITATION PROGRAM FOR THIS PATIENT? 
3. HOW LONG DOES THE CVASC REHABILITATION PROGRAM LAST IN YOUR COUNTRY? 
4. IS IT FULLY COVERED BY SOCIAL SECURITY?
Group Discussion
Results & discussions: Secondary Prevention Case

Very high-risk group:

• General comment: Cardiac Rehabilitation (CR) centres are lacking; there are no standardised programmes.
• 7 out of 8 representatives suppose that the presented patient is a frail patient due to the co-morbidities
• Specific target for this patient should be to avoid complications and to inform the medical staff about any difficulties which might appear
• As there are not a lot CR centres in the countries of this group, the duration of the CR programme is difficult to answer (Georgia = no centre; Latvia = 2 centres; Serbia = 3 centres; Romania = 6 centres)
• The coverage by the health insurance differs from each country from 5 days after stroke up to 3 weeks
Results & discussions: Secondary Prevention Case

High-risk group:

• Not many differences observed to the very-high risk group: CR centres not well established
• Exception: Turkey, but the patients don’t make use of it as they don’t want to commute
• Czechia: CR only after coronary artery bypass graft surgery (CABG) in individual Heart Centres, similar in Estonia and Poland
• CR costs are covered in all countries of this group
Results & discussions: Secondary Prevention Case

Moderate risk group:

• Depending on the severity of each morbidity, frailty needs to be evaluated
• CR target should be to improve functionality and co-morbidity including adherence of the patient
• The average duration of the CR programme is 3 months, covered by the health insurance
• Patients also have the possibility of paying private care
• Slovenia:
  • 8 CR centres: receiving mainly patients post-myocardial infarction (MI)
  • Stationary rehabilitation: problem of loosing contact to the patients
  • Coronary Clubs: organized by patients; meeting 2 x per week for exercise
Results & discussions: Secondary Prevention Case

Low risk group:

- Different access to CR in the countries of this group:
  - Netherlands and Norway: good access
  - Spain: variable access
  - UK: reasonably good access, 1 CR programme

- Even if CR programmes exist, it does not mean that patients make use of it (reason is transportation and patients don’t see the need)

- Funds go into interventions like TAVI (Transcatheter aortic valve implantation), but not into recovering quality of life of patients
Patient Case 2

Presented by Piotr Jankowski
A difficult patient

Piotr Jankowski

Department of Internal Medicine and Geriatric Cardiology
Department of Epidemiology and Health Promotion, School of Public Health
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A 56-year-old teacher came to the GP due to elevated BP values, accidentally found during the home BP measurements over the course of several days:

- 146/92 mmHg
- 148/95 mmHg
- 145/92 mmHg

**Average value:** 146/93 mmHg
The history

Smoking for decades (20 cig./day)

Sedentary lifestyle

No other complaint or health problems

Father died for MI at the age of 60
Brother (64 years) suffered from MI and underwent CABG.
Physical examination

**HR:** 66/min.

**BP:**
- right arm - 150/92 mmHg
- left arm - 152/94 mmHg

**BMI:** 30.5 kg/m²

**Waist:** 103 cm
ECG
Recommendations

✓ Stop smoking
✓ Increase physical activity
✓ Diet
✓ Metoprolol (50 mg/d)
✓ Blood tests
After three weeks

- glucose – 6.0 mmol/l
- K⁺ – 4.9 mmol/l
- creatinine – 81 µmol/l, GFR (MDRD): >60 ml/min/1.73 m²
- uric acid – 320 µmol/l
- AlAt – 29 U/l
- blood cel count – OK
- urine analysis – OK
After three weeks

**Lipid profile**

Total chol.: 5.56 mmol/l (214 mg/dl)
LDL chol.: 3.75 mmol/l (144 mg/dl)
HDL chol.: 0.98 mmol/l (37 mg/dl)
TG: 1.84 mmol/l (165 mg/dl)
Questions

1. Was the patient managed appropriately? What would you do differently?

2. What is the correct management of this patient when knowing the blood test results?
Group Discussion
Results & discussions: Primary Prevention Case

Low risk group:
- The representatives of this group believe that the patient was not managed properly
- A follow-up with concrete actions is needed
- Risk Score to be done
- Netherlands: A survey would be conducted (no survey in the other countries)
- Lipid management would be done differently (lipid lowering = cost effective)
Results & discussions: Primary Prevention Case

Moderate risk group:

This group discussed the smoking issue of this patient:

• Smoking cessation of high importance, but not enough smoking cessation counselling available
  • Portugal: 1 year waiting list
• A main problem is new tobacco products which attract easily young people
Results & discussions: Primary Prevention Case

High-risk group:

• According to SCORE2 the patient is at high risk (12%):
  • Blood pressure and lipid treatment should start immediately
  • Combined medication should be proposed (patient adherence)
Results & discussions: Primary Prevention Case

Very high-risk group:

• This group would advise to give recommendations for one risk factor to start with:
  • Smoking (involving dedicated smoking cessation programme)
  • Or nutrition
• And prescribe statins
  ➢ Re-evaluation after 3 months and eventually add recommendations for another risk factor
Conclusions / 1

1. The access to cardiac rehabilitation and other high-quality services inversely correlates with the risk category of the ESC member countries.

2. The access to CV education programmes is available only in a few countries from the low CV risk category.

3. There is a considerable potential for CV prevention improvement in almost every ESC member country, being the highest in the very high-risk category countries.

4. Sharing opinions, views and discussion with experts with background coming from various health care systems and with different experiences is not only interesting but may inform future guidelines authors about potential and obstacles to implementing the guidelines.
In future, to further stimulate discussion and active participation, the NCPC workshop should last longer, to have the possibility to focus more specifically on the different aspects of CV prevention. The possibility to compare the different approaches is an invaluable added value and the ESC Preventive Cardiology congress is the perfect occasion to fill this gap.
Closing remarks

Elena Cavarretta reminded the National Coordinators of two important activities (see following slides):

➢ Upcoming Digital Round Tables
➢ Update of the Country of the Month reports (new template)

Elena closed the meeting and thanked all coordinators & representatives for their active participation!
Digital Round Tables (DRT): "2021 CVD Prevention Guidelines, from scientific guidance to clinical practice"

- **Objective:** To inquire about progress in the implementation of the 2021 ESC Guidelines on cardiovascular disease prevention in clinical practice since its publication
- **Format:** 90-minute ZOOM meeting, 5-minute slide presentation on four core questions in standardised format by NCPCs and EAPC Young Ambassadors
- **1. Meeting (out of 4):** January 2022; 13 countries with the highest age-corrected cardiovascular mortality (Group 1)
  - *Report,* "Prevention is better than cure but is not always possible in challenging circumstances" (EHJ)
- **To do:** 3 more DRTs to be organized by groups from next highest to lowest age-corrected CV mortality.
- **Lead:** PIC Advisor in charge of the NCPCs network
Lead: Iulia & Piotr, PIC Advisors in charge of the NCPCs network

- 3 sessions to be organized (high, moderate and low age corrected CV mortality)
- Format: 90-minutes ZOOM meeting
- 5-minute slide presentation on four core questions in standardised format by NCPCs and EAPC Young Ambassadors (when in existence)
- Aim: Dedicated session at ESC Preventive Cardiology 2024 with the overall results of the 4 DRT

(Note: very high-risk group session took already place in January 2022)
Digital Round Tables (DRT)
Planning & moderators

❖ Group 2: High age-corrected CV mortality – moderator: Louisa
Albania, Bosnia and Herzegovina, Croatia, Egypt, Estonia, Hungary, Kazakhstan, Lebanon, Morocco, Poland, Slovakia, Tunisia, Turkey
  • 10 May 16h00-17h30: 10 National CVD prevention coordinators and 2 EAPC Young Ambassadors from 9 countries participated
  • a report is in preparation

❖ Group 3: Moderate age-corrected CV mortality – moderator: Panteleimon
Austria, Cyprus, Czechia, Finland, Germany, Greece, Ireland, Kosovo (Republic of), Libya, Malta, San Marino, Slovenia, Sweden
Confirmed date:
  • Fri 16 June 16h30-18h00

❖ Group 4: Countries with low age-corrected CV mortality – moderator: David Niederseer
Belgium, Denmark, France, Iceland, Israel, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Switzerland, United Kingdom of Great Britain and Northern Ireland
Proposed dates:
  • Fri 15 September 16h30-18h00
  • Fri 13 October 16h30-18h00
Country of the Month: update of template

- **Objective:** To facilitate implementation of CVD prevention by providing information on prevention in ESC Cardiac Society member countries and Affiliated Cardiac Society countries.
- **Format:** Short summary on a country webpage with link to full report (pdf)
- **Authors:** NCPC (main author) ideally in collaboration with prevention related organisations, Ministry of Health representatives etc.
- **46 country reports** from ESC National Cardiac Societies and 2 from Affiliated Cardiac Societies available
- First report published in 2013, latest report from 2020
- **Challenge:** Keeping the reports updated
- New template to facilitate update and comparison – work in progress
Thank you!