# OF SURGICAL CONSENSUS STATEMENTS FOR ESOPHAGEAL ATRESIA (EA) DISEASE ERNICA

July 4, 2019

Anke Widenmann-Grolig, Treasurer of EAT

- Thank you Dr. Carmen Dingemann, MHH for contributing her presentation which was a huge workload.
- Thank you PhD Simon Eaton for all the scientific and technical work
- Thank you Prof. Benno Ure for providing this to the patient community





 The Federation of Esophageal Atresia and Tracheo-Esophageal Fistula Support Groups

www.we-are-eat.org



Network Inherited and Congenital Anomalies (ERNICA)

#### EAT - Who we are...

- > A federation whose members are national patient support groups for EA
- > Founded in 2011
- Legally registered in Stuttgart as an 'e.V.'
- International but mainly European
- Seven Board members (elected by the members)
- > Has its own Medical Advisory Board (INoEA founded by Frédéric Gottrand)

EAT and INoEA could be described as an international 'family'!



First Esophageal Atresia Award (EWA) in 2019

for Prof. Frédéric Gottrand, Lille 5<sup>th</sup> World Congress of Esophageal Atresia in Rome, Italy



#### **Hospitals in ERNICA**

There are 20 HCPs (hospitals) in the ERNICA network from 10 countries....

- Belgium
- > Denmark
- > Finland
- > France
- Germany
- > Italy
- Netherlands
- Norway
- Sweden
- > UK

ERNICA is coordinated by Prof. Dr. René Wijnen (Head of

Paediatric Surgery) at Erasmus MC, Rotterdam, The Netherlands



Network
 Inherited and Congenital
 Anomalies (ERNICA)



#### ERNICA

European Reference Networks on Inherited and Congenital Anomalies



# **Esophageal diseases**



## Intestinal diseases



Intestinal failure



Gastroenterological diseases



Malformations of the diaphragm and abdominal wall

#### **ePAGs in ERNICA**

Esophageal diseases Graham, JoAnne, Anke

Intestinal diseases
Annette Lemli & Nicole Schwarzer (SoMA)

cross link to ernUrogen

Intestinal failure
Nadine & Sylvia (do not continue)

Gastroenterological diseases NEW (no ePAGs)

Malformations of the diaphragm and abdominal wall

Beverley Power, Fanny Cauvet







## ERNICA

#### European Reference Networks on Inherited and Congenital Anomalies

#### **Network Activities**

ePAG involvement in every working group

Standards of Care

Research

**Training** 

Registry



## ERNICA

April 2017, Nov 2017, April 2018 ERNICA meetings in Rotterdam, Helsinki, Stockholm Always with participation of patient representatives

- Little evidence on current diagnostic and therapeutic concepts
- Generally accepted guidelines and algorithms lacking

Decision of Workstream

Congenital Malformations and Diseases of the Esophagus



#### **Consensus Conference**

on the Perioperative and Surgical Management of Patient with Esophageal Atresia with Tracheoesophageal Fistula

Follow-up was the additional topic of the ePAGs

#### **Additional Values by Patient Representatives**

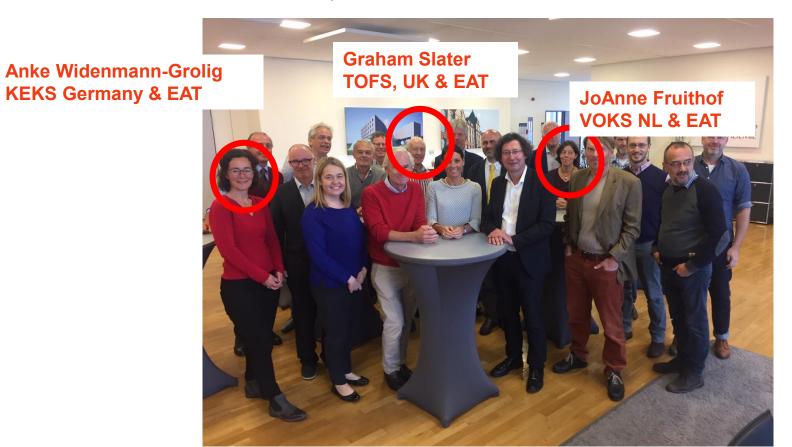
- Including Follow-Up and Transition already in the first consensus conference
- Bridging the existing gap between consensus statements and patient needs by implementing a patient journey - ePAGs have the lead.
- > No double work as Dr. Carmen Dingemann is working in both groups
- Patient journey can use the results of the consensus conference for the internal work before publication







Berlin, 25<sup>th</sup> and 26<sup>th</sup> October 2018





Participants (n = 19)

Members of ERNICA Workstream

Congenital Malformations and Diseases of the Esophagus

Pediatric surgeon	14	
Pediatric gastroenterologist	1	
Methodologist	1	9 countries
Patient support group represent.	3	



#### **Preparation of the Conference**

1

Literature search

-> CD, SE, BM



Item generation

Including Patient representatives

-> Workstream members (Stockholm)

-> CD, SE, BM



Item prioritization

Including Patient representatives

-> Conference participants

5-point Likert scale online survey



Final list containing relevant domains

diagnostics, preoperative, operative and postoperative management, follow-up\*, varia

\*Follow-up" based on ESPGHAN-NASPGHAN Guidelines

Krishnan U et al. J Pediatr Gastroenterol Nutr. 2016



#### **Preparation of the Conference**

Section	Domain	
I	Diagnostics	
II	<b>Preoperative Management</b>	
III	Operative Management 1	
IV	Operative Management 2	Part I
V	Postoperative Management	
VI	Follow-up 1	_
VII	Follow-up 2	Part II
VIII	Varia	





**Voting** 

Including Patient representatives in Berlin



Discussion based on the highest available level of evidence of current literature



Anonymous voting / internet-based system / 1-9 scale

1 Strongly Disagree  $-2 - 3 - 4 - 5 - 6 - 7 - 8 \rightarrow 9$  Fully Agree

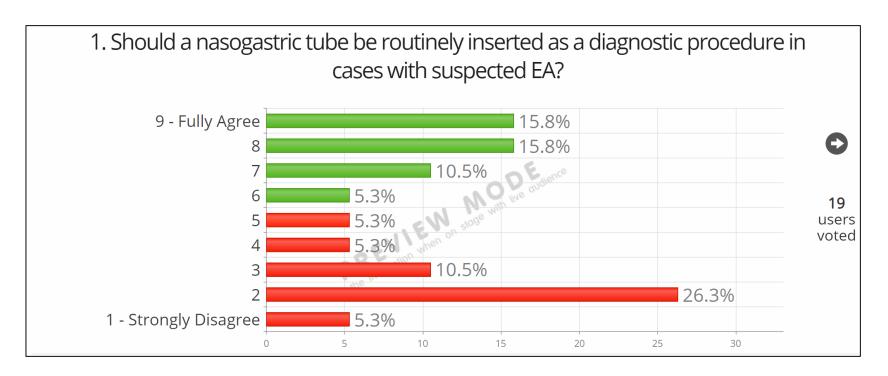


**Definition of consensus** 

> 75% of those voting scoring 6, 7, 8, 9



# **Example of Voting via W VOXVote**

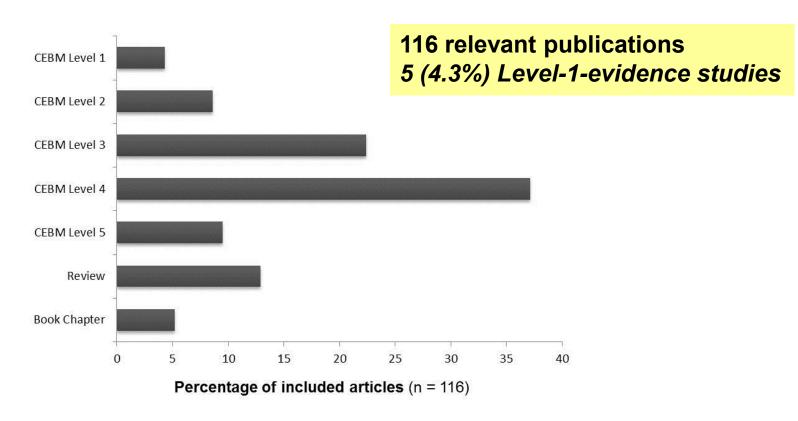


https://www.voxvote.com/





#### Literature



In accordance with the Oxford CEBM Levels of Evidence as published in 2009



#### **Preoperative Management\***

	PREOPERATIVE MANAGEMENT	Consensus	%	Votes	Median
					[range]
7	A replogle tube should be routinely placed into the upper esophageal pouch to	+	100	15/15	9 [6-9]
	allow continuous low pressure suction.				
8	Preoperative antibiotic prophylaxis should be routinely administered as soon	-	13.3	2/15	2 [1-9]
	as the diagnosis is established.				
9	Spontaneous breathing should routinely be favoured.  If assisted ventilation is required, intubation should be preferred to non-	+	100	15/15	9 [9-9]
10	If assisted ventilation is required, intubation should be preferred to non-	+	100	15/15	9 [8-9]
	invasive ventilation.				
11	Tracheobronchoscopy under spontaneous breathing should be performed	-	53.3	8/15	6 [2-9]
	preoperatively to evaluate tracheomalacia.				
12	A central venous line should be routinely placed preoperatively.	-	14.3	2/14	2 [1-7]
13	An arterial line should be routinely placed preoperatively.	-	7.1	1/14	1 [1-8]
14	During preoperative counselling parents should be routinely informed about	+	94.4	17/18	9 [2-9]
	different surgical options such as open and thoracoscopic repair.				

\*before the patient is transferred to operation theatre



#### **Operative Management**

[range] [3-9] [9 [8-9] [9 [1-9] [3 [1-9] [2-9]
9 [8-9] 9 [1-9] 8 [1-9]
9 [1-9] 3 [1-9]
9 [1-9] 3 [1-9]
3 [1-9]
[2-9]
,
9 [7-9]
9 [8-9]
9 [7-9]
` '
9 [5-9]
3 [1-9]
5 [2-9]
9 [5-9]
[6-9]
-
9 [5-9]
0.000



#### **Postoperative Management**

	POSTOPERATIVE MANAGEMENT	Consensus	%	Votes	Median [range]
43	Postoperative ventilation and relaxation should not be routine and reserved for selected patients such as those with tension anastomosis.	+	100	14/14	9 [6-9]
44	Routine postoperative antibiotic treatment for longer than 24 hours should be recommended.	-	13.3	2/15	2 [1-9]
45	A postoperative contrast study of the esophagus should be routinely performed before the initiation of oral feeding.	-	20	3/15	1 [1-7]
46	Feeding via the transanastomotic tube may be routinely initiated at 24 hours postoperatively.	+	100	15/15	9 [7-9]
47	Oral feeding may be routinely initiated after 24 hours postoperatively.	+	100	15/15	9 [6-9]
48	An anastomotic leakage should be routinely managed with a chest drain.	+	92.9	13/14	8 [2-9]
49	An anastomotic leakage within the first 4 postoperative days may be	-	71.4	10/14	8 [1-9]
	considered for surgical revision.				
50	A contrast study, tracheoscopy and esophagoscopy are necessary to exclude a re-fistula, or missed upper pouch fistula, if suspected.	+	93.8	15/16	[3-9]
51	A re-fistula may be initially managed by either endoscopic or surgical	+	100	14/14	9 [6-9]
	approach.				
52	A clinical checklist should be made available including items which should be performed before first discharge (i.e. abdominal and renal ultrasound, re- suscitation training for parents/caregivers).	+	100	18/18	9 [9-9]



Follow-up	Consensus	%	Votes	Median
4 There should be not reclaimed as health for life laws follows		400	40/40	[range]
1 There should be a structured schedule for life-long follow-up	+	100	18/18	9 [8-9]
			18/18	9 [8-9]
Dort II Follow was Move topics potionts			16/18	9 [2-9]
Part II – Follow-up: More topics patients			16/16	8 [6-9]
were competent			12/18	7 [1-9]
e.g. 1 life-long follow-up was key for us			17/18	9 [4-9] 8.5 [3-9]
			17/18	8.5 [3-9]
Results will be published by the end of			15/15	9 [6-9] 9 [4-9]
2019			17/18	
			15/18	8 [1-9]
			4/15	3 [1-9]
			6/13	5 [3-9]
			14/14	8 [6-9]
			15/16	9 [5-9]

delines available





#### ERNICA Consensus Conference on the Perioperative and Surgical Management of Patients with Esophageal Atresia with Tracheoesophageal Fistula

Dingemann C<sup>1</sup>, Eaton S<sup>2</sup>, Aksnes G<sup>3</sup>, Bagolan P<sup>4</sup>, Cross K<sup>5</sup>, De Coppi P<sup>5</sup>, Fruithof J<sup>6</sup>.

Gamba P<sup>7</sup>, Husby S<sup>8</sup>, Koivusalo A<sup>9</sup>, Rasmussen L<sup>10</sup>, Sfeir R<sup>1</sup>, Slater G<sup>12</sup> Svensson JF<sup>13</sup>,

Van der Zee D<sup>14</sup>, Wessel L<sup>15</sup>, Widenmann-Grolig A<sup>16</sup>, Wijnen R<sup>17</sup>, Ure B<sup>1</sup>

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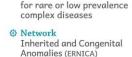
"Department of Fediatrio Surgery, Eroemus MC Potterdam, Petterdam, Netherlands



#### **Success factors**

- > Support of Coordinator (René Wijnen and work-stream clinical leads (Frédéric Gottrand & Benno Ure)
- > Positive relationships at national level e.g. Carmen Dingemann
- > Soft skills of ePAGs and financial support by national organizations
- Very good communication and relationship amongst the ePAG
- > The ePAG advocates were involved in the whole process
- > The ePAGs disseminate the results into the national groups to inform the clinicians in all countries even when there are no members of ERNICA.
- Fast dissemination: EUPSA Congress in June 2019 and during the 5th World Congress of Esophageal Atresia at the end of June 2019

which helped to disseminate the results quicker.



#### **Lessons learned -1**

- ➤ There is no substitute for a close and trusting relationship between clinicians and ePAG advocates, but building this trust takes time (10 years for EAT).
- The question "how do ePAG advocates make sure that they bring a relevant/evident opinion for all patients of this special group"? is not so easy to be trained. Experience in the patient work is compulsory or a good back office team.
- Coordinator support is crucial in 'setting the tone' for the ERN





#### **Lessons learned - 2**

- The use of a recognized methodology also helps to generate consensus statements which have the potential to be disseminated as 'best practice' when there is a lack of scientific 'evidence' as would be normally demanded.
- > We learned how difficult and complex it is to develop an evident consensus statement (first level of evidence).







"We thank all the clinicians of the consensus conference and their engagement. Special thanks to Carmen and Simon who had the major work load. Many thanks to René as our Coordinator and Frédéric and Benno for their openminded leading of the workstream." ePAGs Anke, Graham, JoAnne