



**UNIMORE**  
UNIVERSITÀ DEGLI STUDI DI  
MODENA E REGGIO EMILIA

Department of Medical and Surgical Sciences  
Hematology Unit and Chair  
(Chief: prof. Mario Luppi)

**Esperienza di Integrazione di Cure Palliative Precoci  
nell'Assistenza Sanitaria:**

## **Leucemia Mieloide Acuta e Mieloma Multiplo**

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 **fondazione GIMEMA** onlus  
per la promozione e lo sviluppo della ricerca scientifica  
sulle malattie ematologiche. **FRANCO MANDELLI**

Si ringrazia per il supporto



**SIE**  
Società Italiana  
di Ematologia

Con il patrocinio di

LE CURE PALLIATIVE PRECOCI IN  
**EMATO-ONCOLOGIA:**  
la nuova risposta ai bisogni di pazienti e caregivers

**19 maggio 2023**

**Roma, Hotel Donna Camilla Savelli**



## Disclosures of Leonardo Potenza

Company name	Research support	Employee	Consultant	Stockholder	Speakers bureau	Advisory board	Other
<h1>No Conflicts</h1>							



# Feasibility of EPC Intervention for Patients with Hematologic Malignancies

Study	Intervention	Findings
Selvaggi KJ J Community Support Oncol 2014	HCT Patients. Model of Consultation with Palliative Care Specialists	<b>392 Consultations</b> <b>GOC in 67% of participants</b> <b>Hospice Referral increased from 5% to 41%</b> post-intervention <b>Haematologists reported satisfaction</b> with the program
Loggers ET Biol Blood Marrow Transplantation 2016	HCT Patients. PC-trained nurses. PC Consultation before Transplant and monthly visits.	<b>63% participation rate: 32 pts</b> <b>82%</b> of patients reported feeling <b>very comfortable</b> with the Intervention <b>Improvement of Mood and Sense of Hope</b> (apparently <b>NO negative effects</b> )
Foxwell AM J Palliat Med 2017	PC Nurse practitioners offered discussion of cases with Haematologists	Mean <b>11 Patients</b> discussed <b>per week</b> <b>14.7%</b> of those discussed <b>required full PC Consult</b> <b>Reduction in PC Consultation from 19.5% to 10.2%</b> Increase of <b>GOC discussions</b>
Resick JM J Palliat Med 2020	Phase 1 and 2 study. Nurse led PC Intervention	<b>26 Patients</b> enrolled. <b>78%</b> Consent-to-approach rate. <b>84%</b> enrolled-to-consent rate. <b>69%</b> pts and <b>100%</b> caregivers reported that the intervention helped them better understand the patient's illness and <b>cope</b> . <b>75%</b> of <b>oncologists</b> reported that the intervention improved their <b>patients' quality of care</b> , and <b>25%</b> reported that it helped them take <b>better care of patients</b> .



# Early Palliative care Intervention for Patients with Hematologic Malignancies

Study	Intervention	Findings
El-Jawahri A JAMA 2016 JCO 2017	RCT phase III. Patients who received autologous or allogeneic HCT. <b>Inpatient</b> PC physician, an AP nurse, or physician assistant.	<b>160 pts. 81 EPC</b> , 79 SC. Improvement in QOL, symptom burden, and symptoms of depression and anxiety during HCT. <b>Sustained improvement</b> in their depression symptoms and post-traumatic stress symptoms up to 6 months after HCT hospitalization. <b>Caregivers</b> reported improvement in their depression symptoms and coping
El-Jawahri A JAMA Oncol 2021	RCT phase III. AML Patients. <b>Inpatient</b> PC physician, an AP nurse, or physician assistant.	<b>160 pts: 86 EPC</b> , 74 SC. Better QOL, lower anxiety, depression and PTSD symptoms were maintained longitudinally.  <b>Higher frequency</b> of discussion about <b>EOL care preferences</b> (p = 0.01) and <b>lower frequency of chemotherapy in the last 30 days of life</b> (p = 0.01). No differences in symptom burden, PHQ-9 scores, and changes in the use of avoidant coping strategies, longitudinally. No differences in hospice use, hospice length of stay, and hospitalization in the last week of life.
Rodin G Support Care Cancer 2020	Single Center phase II trial. <b>Mainly Inpatient.</b> 8–12 psychotherapeutic sessions, over 8 weeks by a trained mental health clinician (EASE-psy), and systematic screening of physical symptoms (EASE-phys) with triggered referral to PC. PC team: a physician and nurse.	<b>Feasibility outcome met</b> <b>Less traumatic stress symptoms</b> at 4 and 12 weeks: p = 0.033 <b>Lower pain intensity and pain interference</b> with daily activities at 12 weeks, p = 0.006. <b>Lower rates of pts with ASD or threshold ASD at 12 weeks.</b> No differences in physical symptom severity, symptom-related distress, depressive symptoms, satisfaction with care, and overall quality of life.



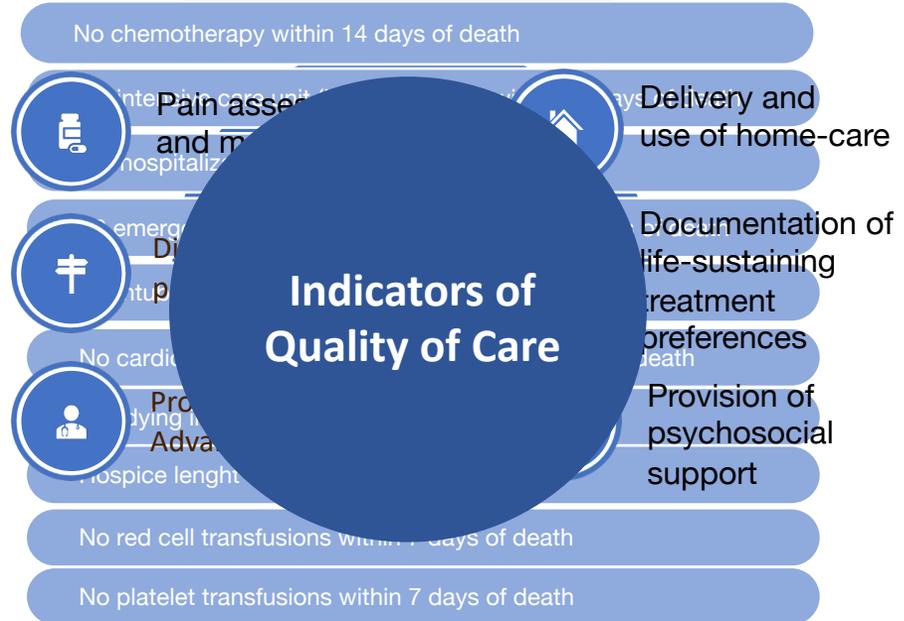
# Outpatient EPC in AML: Modena's Observational Study



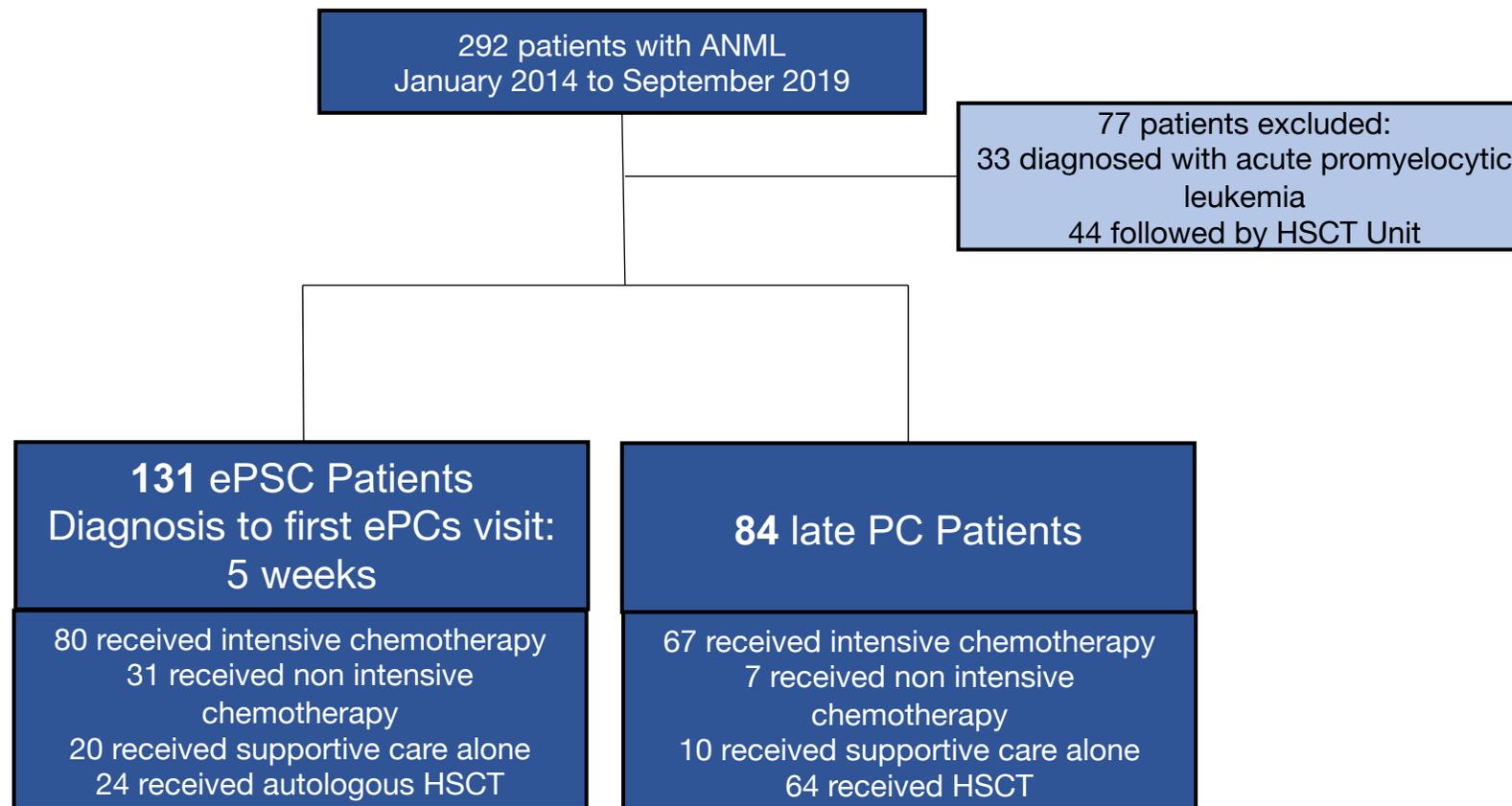
Outpatient ePC Clinic

- Patients with AML from 2014-2019
- PC Team: one physician, one fellow and one psychologist with specialised training and expertise in delivering palliative care and advanced training in communication skills.
- >3 visits
- Within 8 weeks from Diagnosis

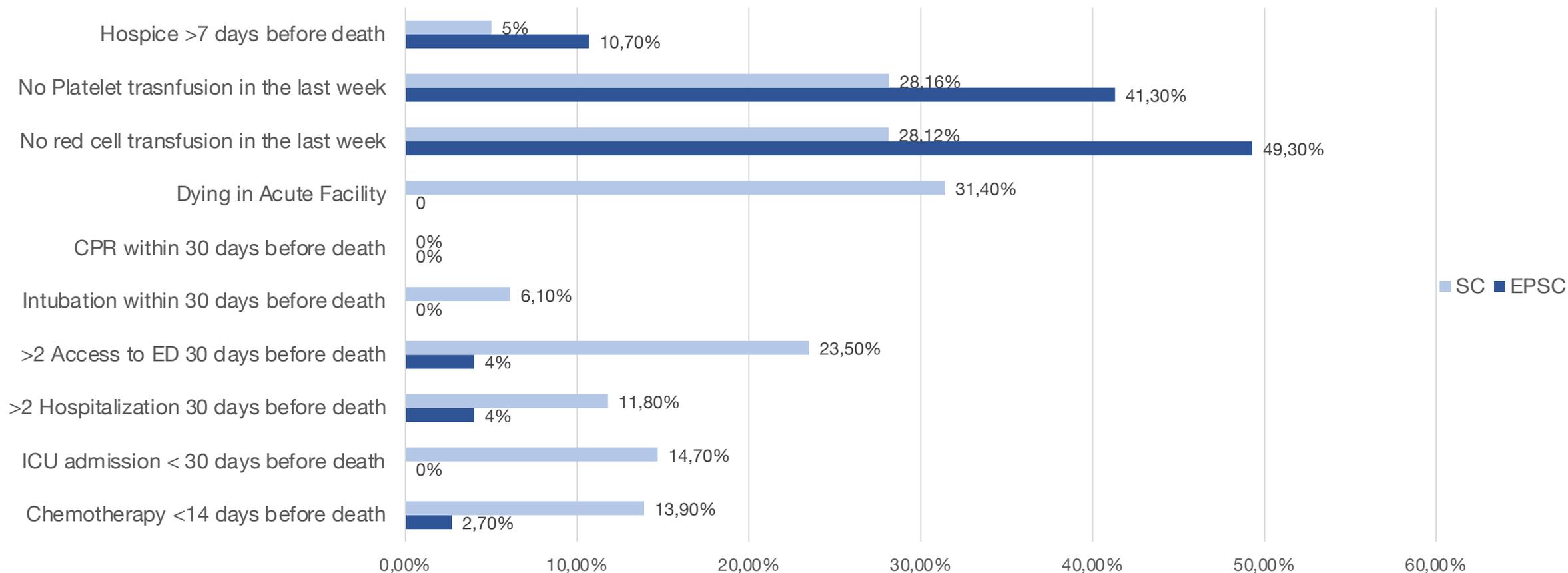
Intervention:  
During routine



# Outpatient EPC in AML: Modena's Observational Study



# Measures of aggressiveness of end-of-life care in patients with AML receiving EPC or SC



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# Quality of Care in AML patients in EPC

	ePSC, all		Late PC, all		RD, % (95% CI)	P value	ePSC, deceased		Late PC, deceased		RD, % (95% CI)	P value
	n/n	%	n/n	%			n/n	%	n/n	%		
Psychological support*, n (%)	72/131	55	41/84	49	61.5 (-7.5 to 19.8)	0.3781	39/75	52	22/40	55	-3 (-22.1 to 16.1)	0.7588
Assessing and managing pain*, n (%)	131/131	100	39/84	46	53.6 (43 to 64.2)	<0.00001	75/75	100	18/40	45	55 (39.5 to 70.4)	<0.00001
Discussion of GOC/prognosis*, n (%)	94/131	71.8	36/84	43	28.9 (15.8 to 42)	<0.00001	70/75	93.3	16/40	40	53.3 (37.1 to 69.5)	<0.00001
Promotion of ACP*, n (%)	75/131	57.3	2/84	2.3	54.9 (45.8 to 64)	<0.00001	64/75	85.3	2/40	5	80.3 (69.8 to 90.8)	<0.0001
Discussion of resuscitation preference*, n (%)	16/131	12.2	2/84	2.3	9.83 (3.3 to 16.3)	0.01111	15/75	20	2/40	5	15 (3.7 to 26.3)	0.0309
Home-care service utilisation*, n (%)	57/131	43.5	12/84	14.2	29.2 (17.9 to 40.5)	<0.00001	48/75	64	12/40	30	34 (16.1 to 51.9)	0.0005
Median duration of home care, days (range)	63.5 (3.0-3273.0)		53.0 (1-96)				57.0 (3.0-394.0)		53.0 (1-96)			
Median time from GOC to death, days (range)	NA		NA				106 (4.0-585.0)		149.5 (11-1714)			
Median time from ACP to death, days (range)	NA		NA				25 (4.0-401.0)		5.5 (4-7)			

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# Pain Management over time in patients with AML receiving EPC

	NRS (0–10)		
	Median	95% CI	P value
Time 0 (baseline)	4	4 to 6	NA
Time 2 (after 1 week)	0	0 to 3	<0.01
Time 3 (after 4 weeks)	0	0 to 1	<0.01
Time 4 (after 12 weeks)	0	0 to 2	<0.01

NA, not applicable; NRS, Numerical Rating Scale.



# Who are the other hematologic malignancy patients who may benefit the most from early access to PC?

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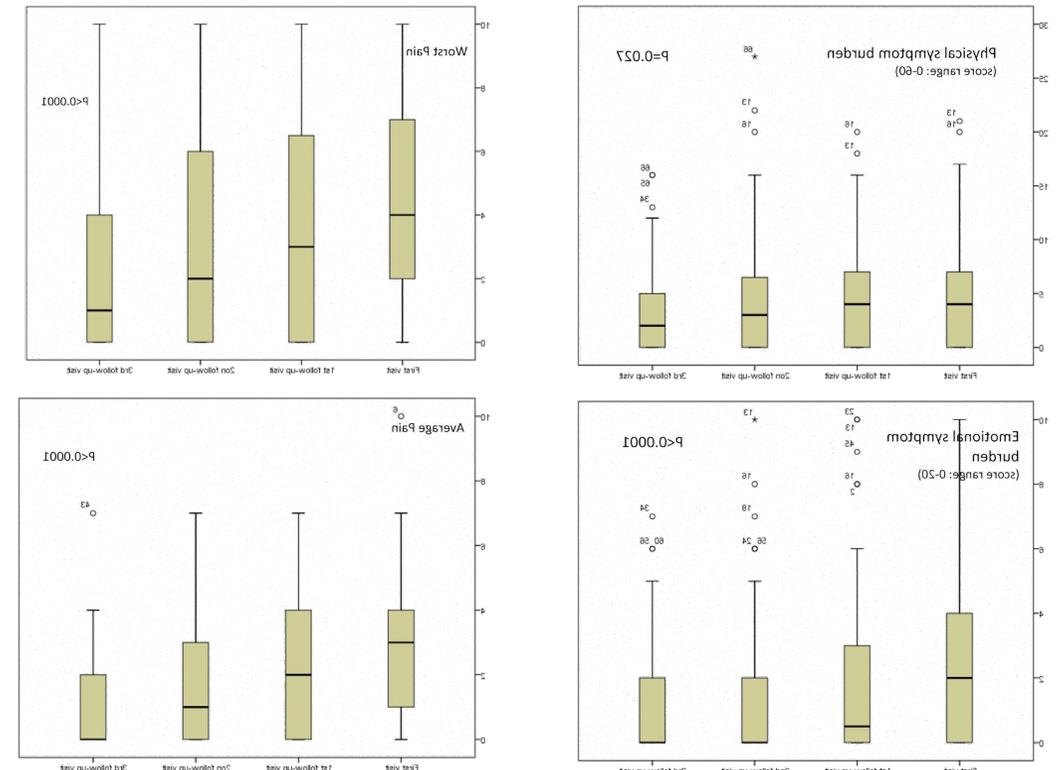
# MM Symptom Burden, Perceived Control, and Quality of Life

MM tot Pts	283 (100%)
Eating and nutrition	176 (61%)
Exercising and being physically active	168 (59%)
Moving around (walking, climbing, stairs, lifting, etc.)	159 (56%)
Feeling too tired to do the things you need or want to do	157 (55%)
Pain and/or physical discomfort	150 (52%)
Sleep problems	132 (46%)
Thinking clearly (eg, “chemo brain,” “brain fog”)	134 (46%)
Changes or disruptions in work, school, or home life	121 (42%)
Intimacy, sexual function, and/or fertility	105 (37%)
Worrying about family, children, and/or friends	107 (37%)
Body image and feelings about how you look	103 (36%)



# MM may represent a prime example of a population that could potentially benefit

	PATIENTS (N/%)	
TOT	325	
PC Consultation	43 (13.2)	20 (46.5) Diagnosis 15 (34.9) 2nd or more line 8 (18.6) FU
PAIN		39 (90.7)
Ev aluation of Setting		4 (9.3)

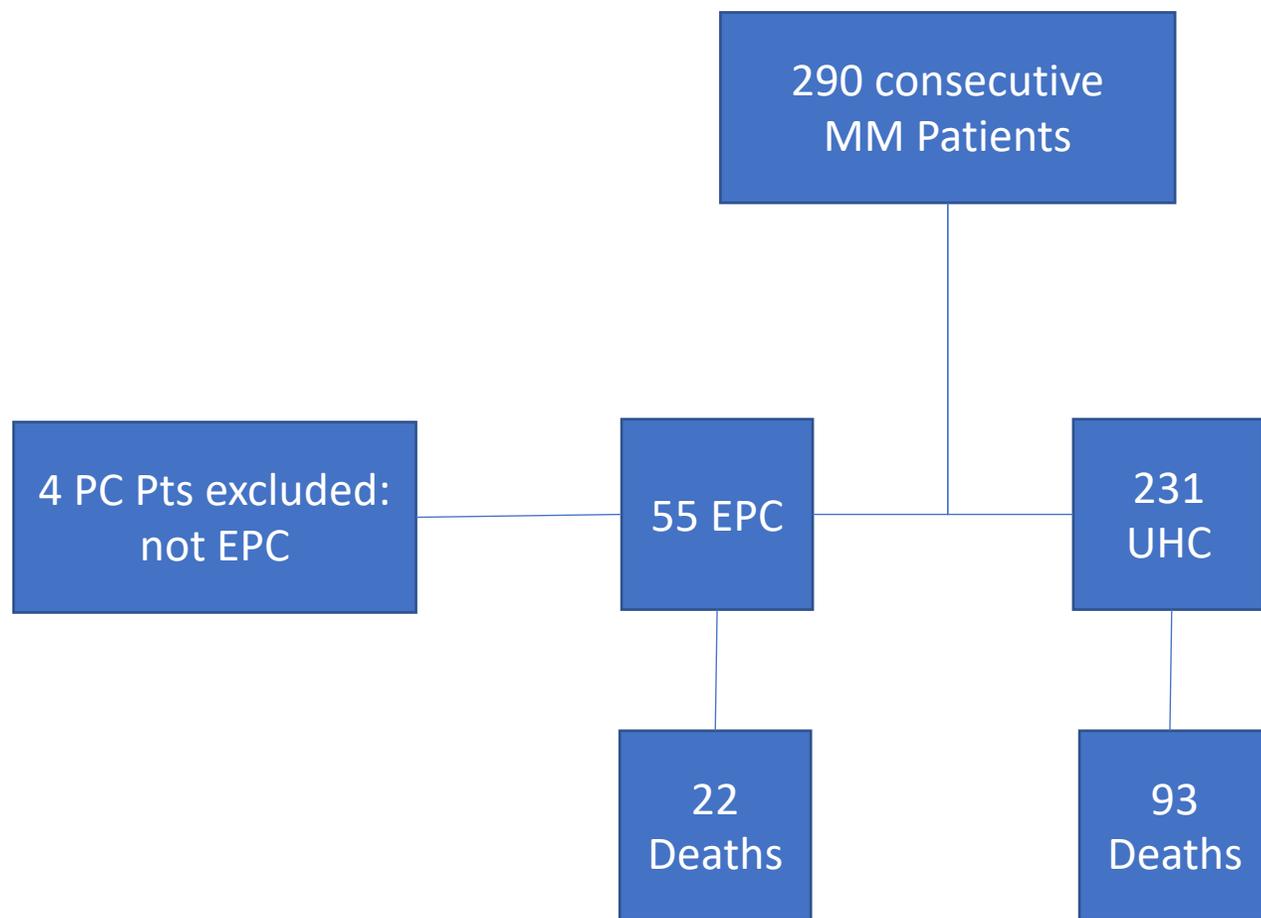


Pallotti MC et al. Suppor Car Cancer 2022, 30:2293

Porta-Sales J et al. J Pain Symptom Manage 2017, 54:692



# Outpatient EPC in MM: Modena's Observational Study



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Giusti D, Potenza L *et al.* *in preparation*



# Outpatient EPC in MM: METHODS

Quality of Palliative Care	Indicators	Aggressiveness at EOL
Pain assessment and management		No chemotherapy within 14 days of death
Provision of psychosocial support		No chemotherapy within 30 days of death
Discussion of GOC		No Intubation within 30 days of death
Promotion of Advance Care Planning		No CPR within 30 days of death
Delivery and use of home-care service		Access to ED ≥2 within 30 days of death
		Hospitalisation ≥2 within 30 days of death
		Hospice
		No Intubation within 30 days of death



# Outpatient EPC in MM: RESULTS

	Patients	EPC	UHC
	286	55	231
<b>Age</b> [median (range)]	66.5 (33-93)	67 (33-89)	66 (40-93)
<b>Sex (N/%)</b>			
M/F	161 (56)/ 125 (43)	29 (53)/ 26 (47)	132 (57)/ 99 (43)
<b>Median Follow-up</b> (m)		41	38
<b>MMFS</b> (N/Pts >65y/%)			
Fit	47/157 (30)	13/37 (35.2)	34/120 (28,3)
Unfit	54/157 (34.3)	12/37 (32.4)	42/120 (35)
Frail	56/157 (35.7)	12/37 (32.4)	44/120 (36,7)

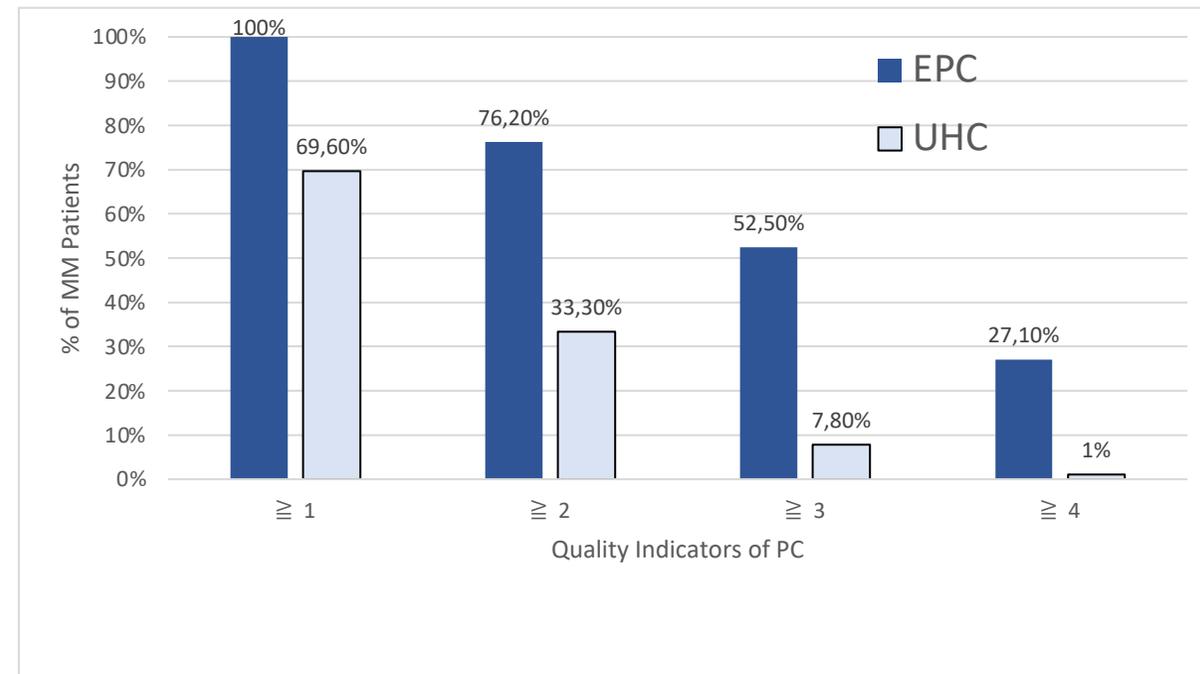
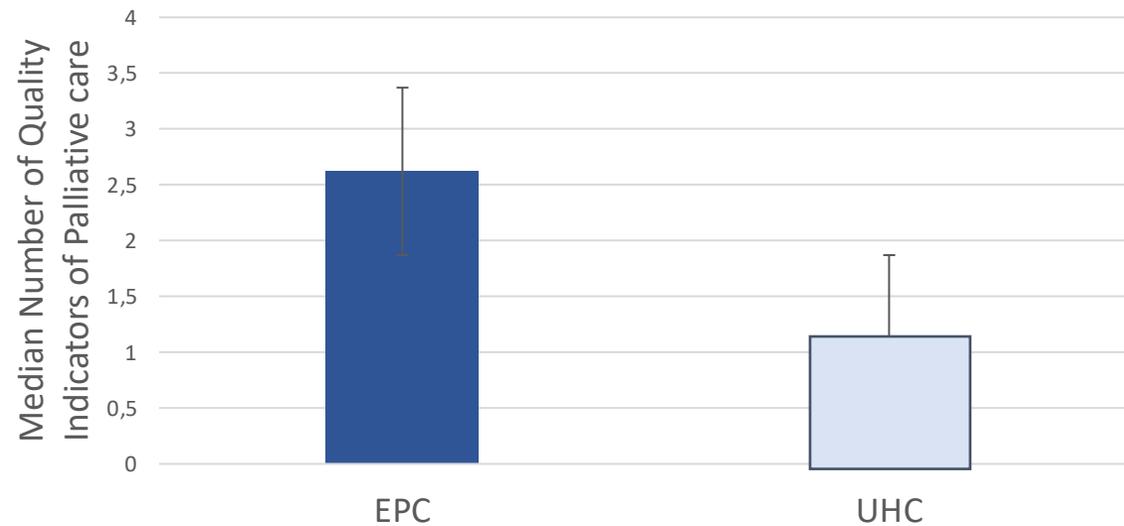
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# Outpatient EPC in MM: Quality Indicators of Palliative Care



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# Outpatient EPC in MM: Quality Indicators of Palliative Care

Indicators	EPC N = 55 (%)	UHC N=231 (%)	Measure	Adjusted (95%CI)	p
Psychological Support	64.4	28.6	OR	4.64 (2.41-8.43)	<0.0001
Assessing and managing pain	100	68.4	OR	nc	nc
Discussion of GOC	74.6	4.3	HR	21.44 (9.75-47.16)	<0.0001
Promotion of ACP	13.6	0.0	HR	nc	nc
Home-care service utilization	30.5	22.5	HR	1,1 (0.84-2.71)	0.1638

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# Outpatient EPC in MM: Pain Management and Duration of Treatment with Opiates

	Pain Management over time (mean NRS±SD)				
	T0	W1	p	W4	p
EPC	1.86±2.78	1.03±2.24	0.0184	0.41±1.57	<b>0.001</b>
UHC	0.93±2.20	0.71±1.69	0.0678	0.73±1.75	0.0608
	Duration of Treatment with Opiates (mean days±SD)		p		
EPC	1061.33±946.45		<b>0.00007</b>		
UHC	556±604.02				

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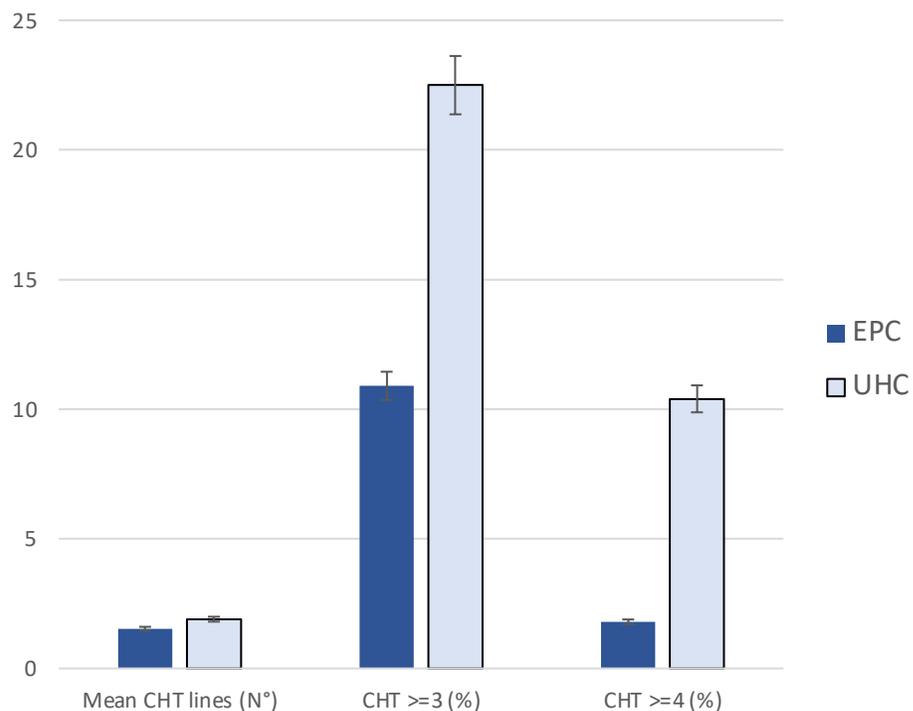


# Outpatient EPC in MM: Reduced Aggressiveness at EOL

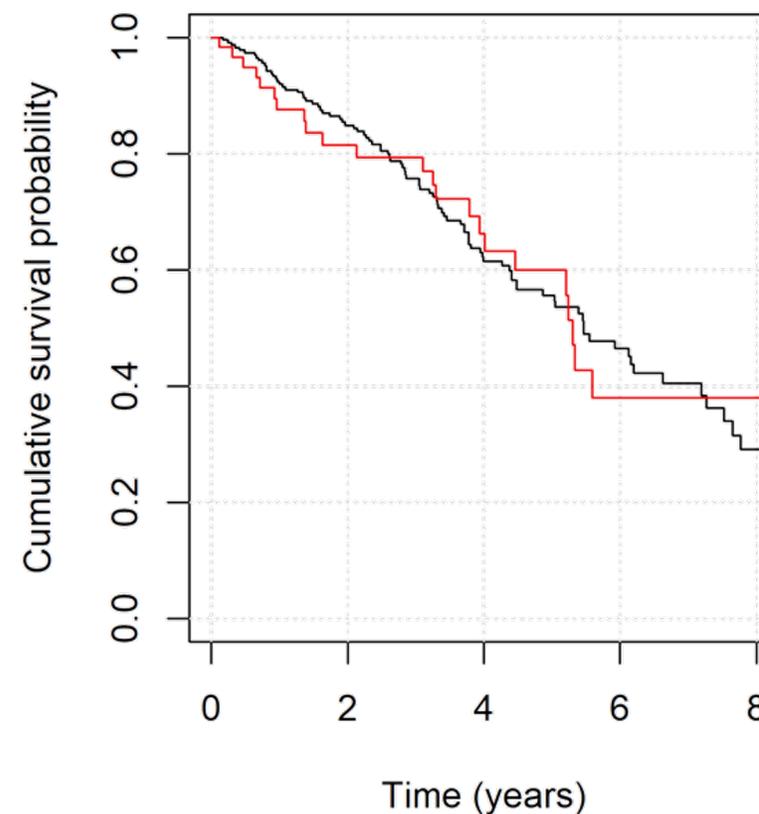
Indicators	EPC N=22 (%)	UHC N=93 (%)	Adjusted OR (95%CI)	p
<b>No Anti-Myeloma Treatment</b>				
Within 14 days of death	95.5	76.3	8.33 (0.89-100)	0.06
Within 30 days of death	72.7	58.1	2(0.60-6.66)	0.25
<b>No Intubation</b> within 30 days of death	100	96.7	nc	nc
<b>No CPR</b> within 30 days of death	100	98.9	nc	nc
<b>Access to ED</b> ≥2 within 30 days of death	0	2.2	nc	nc
<b>Hospitalisation</b> ≥2 within 30 days of death	9.1	12.9	1.63 (0.24-11.12)	0.61
<b>Hospice</b>	13.6	9.7	0.94 (0.20-4.553)	0.94



# Outpatient EPC in MM: Reduced Aggressiveness at EOL



OS: EPC = 5.3 y; UHC = 5.4 y



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# KEY MESSAGES

1. **Our results support and expand the recent data of the literature**, including one phase III RCT, by showing that **EPC** may be delivered to **AML patients** even in the **outpatient** setting.
2. **Real-life EPC in AML** are associated with **high rates of quality indicators** for palliative care and very **low rates of aggressive** treatment near the **end of life**.
3. Our data suggest that **EPC is feasible also in patients with MM** and results in **better quality of care**, including **better management of pain**, more **psychological support**, more frequent **GOC and ACP discussions**, and a **trend to reduced aggressiveness** at the **EOL**.
4. Further **prospective comparative studies** are required to evaluate the effect of **EPC in patients with other Hema Cancers**. Efforts are required **to standardize the content of the intervention** and to **improve the availability of Training Program in PC**.



# Acknowledgment



Dipartimento di Scienze Mediche e Chirurgiche  
Materno-Infantili e dell'Adulto

[www.unimore.it](http://www.unimore.it)

1° Master Universitario di Secondo Livello

**LE CURE PALLIATIVE PRECOCI E SIMULTANEE  
IN ONCO-EMATOLOGIA E MEDICINA INTERNA:  
LA CLINICA, LA COMUNICAZIONE  
E LA QUALITÀ DI VITA**

**Direttore del Master:** prof. Leonardo Potenza (Unimore)  
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**Referente:** dott.ssa Eleonora Borelli (Unimore)  
**Comitato scientifico:** dott.ssa Elena Bandieri, prof. Roberto D'Amico, prof. Massimo Dominici, prof. Fabio Efficace, dott. Fabio Gilioli, prof. Frank Reinhard Heinrich Lohr, dott. Giuseppe Longo, prof. Mario Luppi

Da settembre 2023 a giugno 2025  
c/o Centro Oncologico Modenese (COM) e Centro Servizi  
Policlinico di Modena - Largo del Pozzo 71, Modena

#### Presentazione

La prima edizione del Master, nasce dall'esigenza di fornire ai medici competenze specifiche, teoriche e pratiche, per offrire cure palliative precoci e simultanee ai pazienti onco-ematologici secondo le indicazioni delle più aggiornate Linee Guida Internazionali e Nazionali, oltre che le attuali disposizioni legislative.

Il programma di studi, prevede una formazione multidisciplinare integrata nell'ambito delle cure palliative precoci e simultanee e delle cure oncologiche ed emato-oncologiche standard.

Dopo un'iniziale panoramica sugli aspetti storici e normativi del modello, verranno approfonditi gli aspetti clinici e relazionali attraverso una struttura didattica innovativa che riflette la traiettoria della malattia e il decorso temporale della gestione del paziente. I titoli del Master impareranno a gestire i sintomi della malattia, a conoscere le terapie standard onco-ematologiche, a interfacciarsi con le modalità di accettazione della diagnosi e di adattamento alla malattia del paziente, a coinvolgere i pazienti, le loro famiglie e i caregivers nei processi decisionali, a ad affrontare le questioni etiche e spirituali associate al fine vita. Verranno integrate le strategie comunicative di base e avanzate più funzionali per il paziente, la sua famiglia e i caregivers secondo il modello

comunicativo evidence-based di VitalTalk ([www.vitaltalk.org](http://www.vitaltalk.org))

Al termine del corso, i discenti saranno in grado di offrire, fin dalle fasi iniziali della malattia, cure palliative di alta qualità ai pazienti e ai caregivers. Saranno inoltre in grado di collaborare con team multidisciplinari, di interlegare con i servizi socio-sanitari pubblici e privati e con il terzo settore, e di declinare la propria esperienza in ottica di ricerca clinica.

La presenza di docenti esteri, Italiani e Stranieri, offrirà ai discenti la possibilità di confrontare le esperienze di cure palliative in Regione Emilia Romagna con quelle in altre Regioni Italiane e con quelle in Canada (Prof.ssa Camilla ZIMMERMANN, Princess Margaret Cancer Centre, University of Toronto, Toronto) e in USA (Prof. Eduardo BRUERA, MD Anderson Cancer Center, University of Texas, Houston, TX e Prof.ssa Odejide OREOFE, Dana-Farber Cancer Institute, Harvard Medical School, Boston, MA). Il confronto sui temi della spiritualità sarà favorito, tra gli altri, da Don Elio CASTELLUCCI, Arcivescovo Abate di Modena-Nonantola, Vescovo di Carpi e Vicepresidente della Conferenza Episcopale Italiana.

#### Sedi di tirocinio:

Ambulatorio di Cure Palliative Precoci Onco-Ematologiche, Carpi, Azienda USL Modena; Cattedra ed Unità Operativa Complessa di Ematologia ed altre Unità Cliniche del Dipartimento di Oncologia ed Ematologia, Azienda Ospedaliera Universitaria di Modena.



Info: Coordinatore Tecnico-Scientifico del Direttore: dott.ssa Eleonora Borelli ([eleonora.borelli@unimore.it](mailto:eleonora.borelli@unimore.it))



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