L'ASSISTENZA AL PAZIENTE ANZIANO CON FRATTURA DI FEMORE: STATO DELL'ARTE E PROSPETTIVE FUTURE

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Aging Clinical and Experimental Research
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CONSENSUS DOCUMENT

Orthogeriatric co-management for the care of older subjects with hip fracture: recommendations from an Italian intersociety consensus

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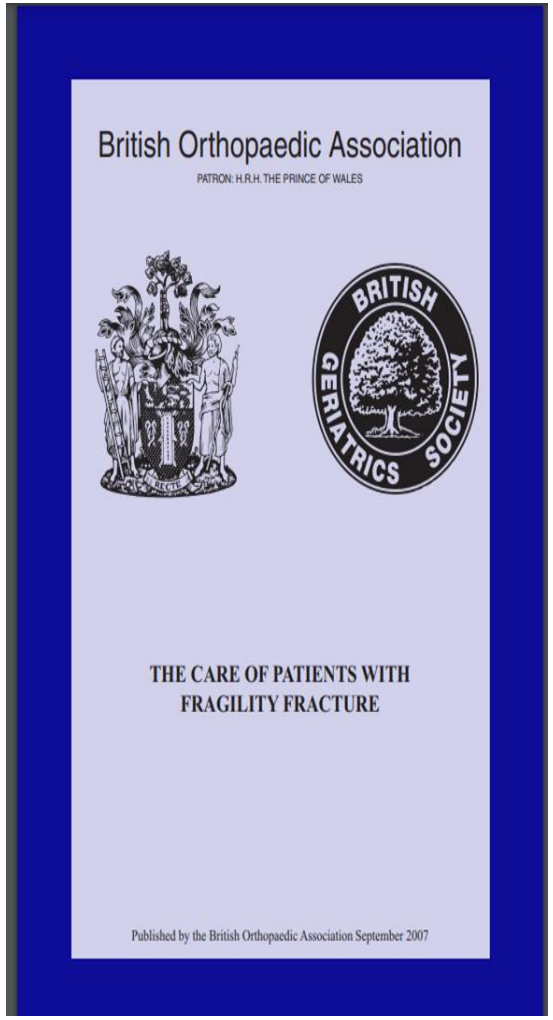
2007: The **Blue Book**



1. Ricovero veloce dopo consulenza ortopedica
2. Valutazione multidimensionale veloce con notizie mediche, chirurgiche e anestesiologiche
3. Intervento il prima possibile
4. Intervento fatto bene
5. Precoce mobilizzazione
6. Precoce riabilitazione
7. Precoce dimissione e riabilitazione sul territorio
8. Prevenzione secondaria delle fratture

1. Tutti i pazienti con frattura di femore dovrebbero essere ammessi in Ortopedia entro 4 ore dall'ingresso in PS
2. Tutti i pazienti FIT dal punto di vista medico devono essere operati entro 48 ore dall'ingresso “within normal working hours”
3. Tutti i pazienti vanno valutati per prevenire le ulcere da pressione
4. Ci dovrebbe essere un ACCESSO DI ROUTINE ad un SUPPORTO ORTOGERIATRICO ACUTO
5. A tutti i pazienti va prescritta la terapia antiriassorbitiva (salvo controindicazioni)
6. A tutti i pazienti va costruito un piano multidimensionale per prevenire le cadute future.

Precoce

Il prima possibile

entro 48 ore

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CLINICAL ARTICLE

Hip Fractures: Therapy, Timing, and Complication Spectrum

Dominik Saul, MD, Juliane Riekenberg, MD, Jan C Ammon, MD, Daniel B Hoffmann, MD, Stephan Sehmisch, MD

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Results: Among the proximal femur fractures (n = 358), 46.6% were pertrochanteric, 11.2% subtrochanteric, and 42.2% femoral neck fractures. Operation upon hip fractures was managed regularly within 24 hours of injury (73%; mean for femoral neck: 28.3 hrs.; mean for pertrochanteric fractures: 21.4 hrs.; mean for subtrochanteric fractures: 19.5 hrs.). Delayed treatment, as well as implantation of hip total endoprosthesis (TEP), increased the overall length of hospital stay (15.4 *vs* 17.6 days; 18.1 *vs* 15.8 days). Accordingly, surgical procedures performed within 24 hours of injury resulted in a shorter hospital residence. Longest delay of operation was measured for hip fractures (28.3 hrs.).
In 351 patients, secondary injuries were detected in 94 individuals (26%), with fractures being the most common secondary injury (n = 40). We recorded postoperative complications of nonsurgical and surgical origin, and 33.6% of our patient cohort displayed complications. Complications were distributed among 118 patients. There was no significant difference in complications regarding the time of operation, with most nonsurgical and surgical complications appearing within 24 hours after operation (n = 110 *vs* n = 31). Nonsurgical complications, such as anemia (n = 49) and electrolyte imbalances (n = 30), were observed more frequently than surgical complications (n = 107 *vs* n = 34); however, these complications were reduced by delay in surgery (82.0% in 6–24 hrs. *vs* 74.2% in ≥24 hrs.). Anticoagulant therapy and age did not affect postoperative complications. The hospital mortality of patients was 6.2%. Follow-up was restrained to ambulatory visits in the clinic.

Conclusions: Surgical management of hip fractures performed within 24 hours of injury minimizes hospital stay. We did not detect significant differences in the spectrum or number of complications regarding delay of surgery. Surgical complications mainly occur with rapid primary care, and medical complications can be reduced by more intensive preparation of patient and operation procedures.

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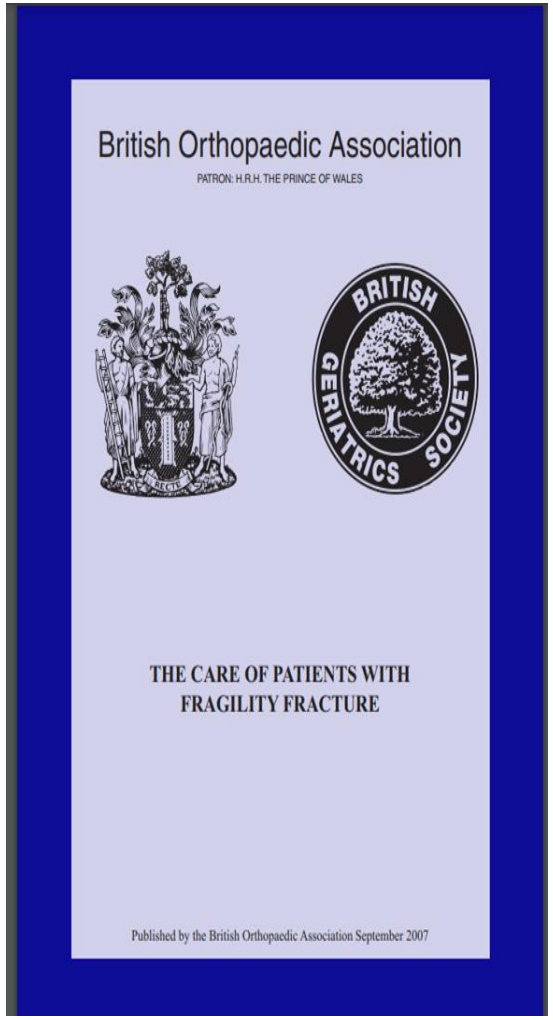

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6. A tutti i pazienti va costruito un piano multidimensionale per prevenire la cadute future.

We recommend performing surgery **as soon as possible** although it may be delayed up to the **maximum limit of 48 h** if other medical conditions require stabilization

Se il paziente è **FIT** deve andare all'intervento in 12-24 ore

Pre-fracture functional state and comorbidities should determine the timing of surgery, **giving priority to patients with higher risk of complications and, therefore, suboptimal post-operative functional recovery**

Comprehensive geriatric assessment

The comprehensive geriatric assessment (CGA) is a multimodal, multidisciplinary process aimed at identifyi
patient needs, planning care, and improving clinical
functional outcomes [14]. The CGA generally incl
clini idities
poly s of cogni
tive. ral status,
toge functional
inde y) suppor
The , lengt
hospital stay, and discharge to an increased level of
particularly in older patients with HF [4, 15]. As s
CGA is recommended in all individuals with HF as t
multidimensional and multidisciplinary tool of choice to assess clinical and pathological profiles, residual skills, as well as the short- and long-term prognosis.

Forza della raccomandazione A

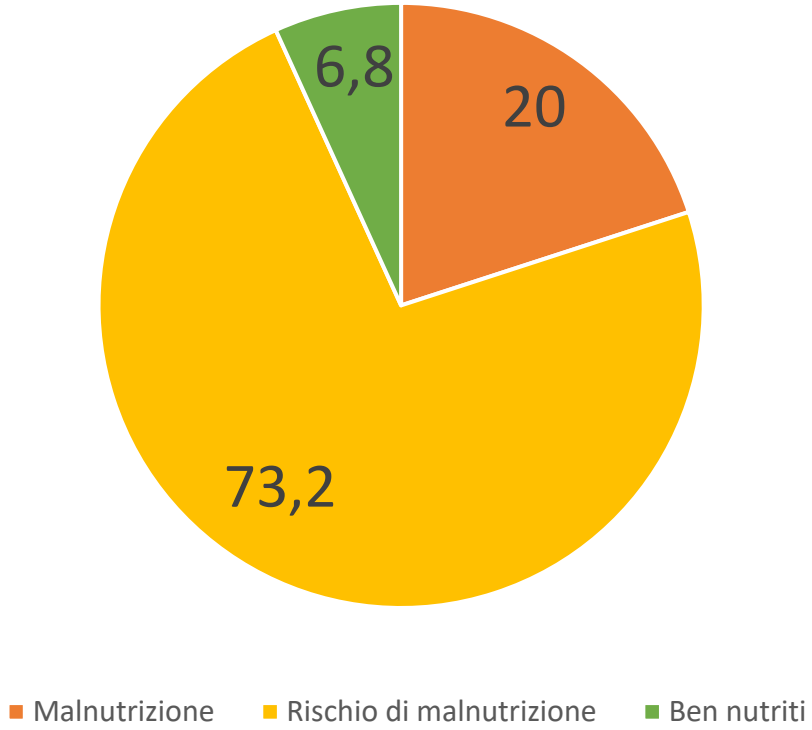
Nutritional status should be assessed during early hospital stay and reassessed throughout hospitalization to enable tailored intervention
Recommendation High A

Test di Screening: Mini Nutritional Assessment Short Form

We recommend the multidisciplinary approach– **including the involvement of a dietician**–to the prevention of post-operative malnutrition
Recommendation High A

Cosa succede a Modena

Prevalenza di Malnutrizione (MNA-SF)



I	Non malnutriti (N=80)	Malnutriti (N=20)	P
Età media	83,40 ± 8,03	88,70 ± 8, 59	0,009
Sarc-F	4,25 ± 2,78	5,32 ± 2,71	NS
Hand grip	15,68 ± 12,39	10,29 ± 5,27	0,003
Charlson Index	6,19 ±1,81	7,26 ± 1,99	0,022
SPMSQ	2,81 ± 2,73	4,42 ± 2,56	0,011
4AT	2,80 ± 3,86	4,63 ± 4,75	0,041
ADL	4,65 ± 1,81	4,11 ± 1,96	NS
IADL	4,73 ± 3,09	2,33 ± 2,82	0,002

Infezioni nosocomiali	3,8 %	0%	NS
Polmonite nosocomiale	0%	1%	NS
IVU	25%	21,5%	NS
Dolore	66,7%	50%	NS

Patients with HF are at high risk of recurrent fracture, we, therefore, recommend secondary prevention of fragility fractures with approved drug therapies (i.e., bone antiresorptive or bone anabolic drugs)
Recommendation High A

I dati

Secondo il rapporto su "L'uso dei farmaci in Italia" (dati 2020) dell'**Osservatorio nazionale sull'impiego dei medicinali** (OSMED), solo il 52,5% dei pazienti mostra alta aderenza al trattamento antipertensivo, mentre oltre il 70% sospende il trattamento nei primi 6 mesi. Ancora peggiori i riscontri relativi ad altri farmaci: gli ipolipemizzanti sono fermi al 41,9%, gli antidepressivi al 37,2%, gli antidiabetici al 28,9%, fino al record negativo del 23,2% per i broncodilatatori e gli altri medicinali per l'asma. La categoria terapeutica in cui si riscontra la migliore aderenza è quella dei farmaci per l'osteoporosi con circa due pazienti su tre (67,7%) che rispettano le prescrizioni dello specialista.
La stima complessiva è che in Italia solo la metà dei quasi 8 milioni di pazienti con malattie croniche assume i farmaci in modo corretto.

Fracture Liaison Services

WHAT IS CAPTURE T

Welcome to the Capture the Fracture®
recognition, resources, training and toc
Coordination Programs (Fracture Liaiso

Capture the Fracture® was developed
Foundation to facilitate the implementatic
models of care for secondary fracture p
single most important step in directly im
spiraling fracture-related healthcare costs worldwide.

In patients with dementia or cognitive impairment undergoing surgery for HF, we recommend **the same rehabilitation** process as used with healthy individuals, including early mobilization, postural changes and standing with weight bearing.

If adequately treated, patients with dementia or cognitive impairment display post-fracture functional recovery comparable to those seen with healthy individuals

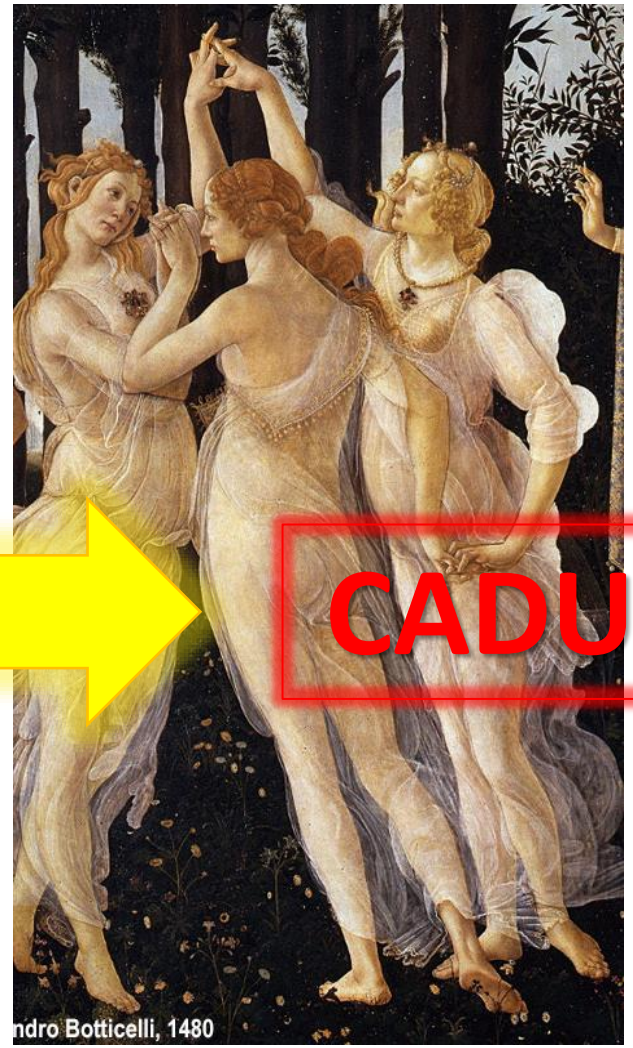
Injury. 2018 Aug;49(8):1398-1402. doi: 10.1016/j.injury.2018.04.014. Epub 2018 Apr 20.

Orthogeriatric co-management - managing frailty as well as fragility

Giulio Pioli [1], Chiara Bendini [2], Paolo Pignedoli [3], Andrea Giusti [4], David Marsh [5]

A key element of an effective process of care is a true co-managed approach that applies quality standards and provides a fast-track pathway of care, minimises the time the patient spends in bed, and reduces postoperative complications by means of standardised procedures.

The occurrence of a fragility fracture is the strongest risk factor for a subsequent fracture. Moreover, frail subjects have a further risk of fracture due to high risk of falls - related to loss of muscle mass, multiple illnesses, impaired balance and weakness. **Thus, effective secondary prevention strategies are essential to reduce morbidity and mortality after hip fracture, and they are currently a standard task of orthogeriatric care.**



Se si interviene su uno dei tre fattori, si riduce il rischio degli altri due

…LE TRE DIS-GRAZIE…

Statement	Type	Quality of evidence	Strength of recommendation
We recommend the determination of oxyhaemoglobin saturation using the pulse oximeter (percutaneous oxygen saturation, SpO_2) in all patients with HF	Recommendation	Moderate	A
We suggest performing ABG analysis in specific clinical situations, i.e., diagnosis and classification of respiratory failure or, in case of heart failure, those with a $SpO_2 < 92\%$ and/or in the suspicion of hypercapnia	Recommendation	Moderate	B

EMOGAS

Team Multidisciplinare

- Deve includere AL MINIMO (EVIDENZA A):
  - GERIATRA
  - ORTOPEDICO
  - ANESTESISTA
- Nel post-chirurgico: FISIATRA E FISIOTERAPISTI
- Ma anche
  - Dietista
  - Infermiere formato
  - OSS formato

Aging Clinical and Experimental Research

Statement	Type	Quality of evidence	Strength of recommendation
We recommend that the patient and the family take an active role in defining the rehabilitation programme including its timing	Recommendation	High	A

SEGUIRE LE LINEE GUIDA E I DOCUMENTI DI CONSENSO

CREDERE NEL VALORE CULTURALE DEI GRUPPI DI STUDIO
(GRUPPO ITALIANO ORTOGERIATRIA)

Ma pensare positivo significa che se cado giù dalle scale devo dire “wow sono già giù“?...🤔