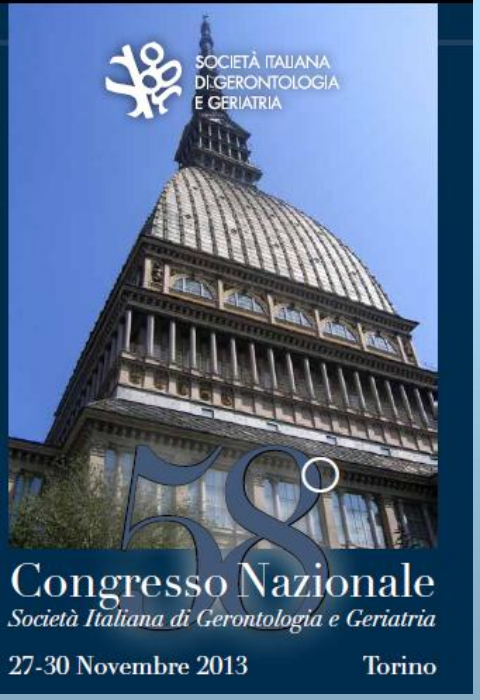
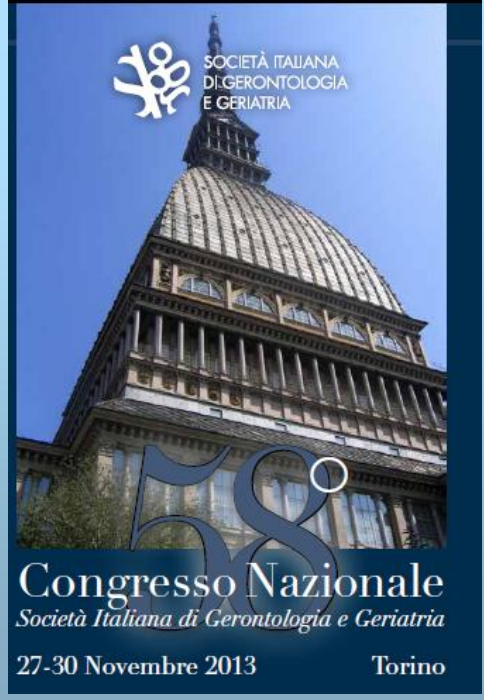


Il geriatra legge le nuove linee guida ESH



Andrea Ungar, MD, PhD, FESC

Syncope Unit, Hypertension Centre
Geriatric Cardiology and Medicine
University of Florence, Italy

Guidelines

2007 ESH-ESC Practice Guidelines for the Management of Arterial Hypertension

ESH-ESC Task Force on the Management of Arterial Hypertension

Authors/Task Force Members: Giuseppe Mancia, Co-Chairperson[a] (Italy), Guy De Backer, Co-Chairperson[b] (Belgium), Anna Dominiczak[c] (UK), Renata Cifkova[d] (Czech Republic), Robert Fagard[e] (Belgium), Giuseppe Germano[f] (Italy), Guido Grassi[g] (Italy), Anthony M. Heagerty[h] (UK), Sverre E. Kjeldsen[i] (Norway), Stephane Laurent[j] (France), Krzysztof Narkiewicz[k] (Poland), Luis Ruilope[l] (Spain), Andrzej Rynkiewicz[m] (Poland), Roland E. Schmieder[n] (Germany), Harry A.J. Struijker Boudier[o] (Netherlands), Alberto Zanchetti[p] (Italy)

Journal of Hypertension 2007, **25**:1751 - 1762

“Elderly” citato 16 volte

SOCIETÀ ITALIANA GERONTOLOGIA E GERIATRIA

CONGRESSO NAZIONALE

52° Firenze, Palazzo dei Congressi

28 novembre - 2 dicembre 2007

CHE SUCCEDE QUANDO IL GERIATRA LEGGE LE NUOVE LINEE GUIDA PER IL TRATTAMENTO DELL'IPERTENSIONE ARTERIOSA?

Andrea Ungar

Centro di Riferimento Regione Toscana per l'Ipertensione Arteriosa dell'Anziano

Unità di Medicina e Cardiologia Geriatrica

Dipartimento del Cuore e dei Vasi
Azienda Ospedaliero Universitaria Careggi - Firenze

Reappraisal of European guidelines on hypertension management: a European Society of Hypertension Task Force document

Giuseppe Mancia[a], Stéphane Laurent[b], Enrico Agabiti-Rosei[c], Ettore Ambrosioni[d], Michel Burnier[e], Mark J. Caulfield[f], Renata Cifkova[g], Denis Clément[h], Antonio Coca[i], Anna Dominiczak[j], Serap Erdine[k], Robert Fagard[l], Csaba Farsang[m], Guido Grassi[n], Hermann Haller[o], Antony Heagerty[p], Sverre E. Kjeldsen[q], Wolfgang Kiowski[r], Jean Michel Mallion[s], Athanasios Manolis[t], Krzysztof Narkiewicz[u], Peter Nilsson[v], Michael H. Olsen[w], Karl Heinz Rahn[x], Josep Redon[y], José Rodicio[z], Luis Ruilope[a1], Roland E. Schmieder[a2], Harry A.J. Struijker-Boudier[a3], Pieter A. van Zwieten[a4], Margus Viigimaa[a5] and Alberto Zanchetti[a6]

Journal of Hypertension 2009, **27**:000-000

“Elderly” citato 15 volte

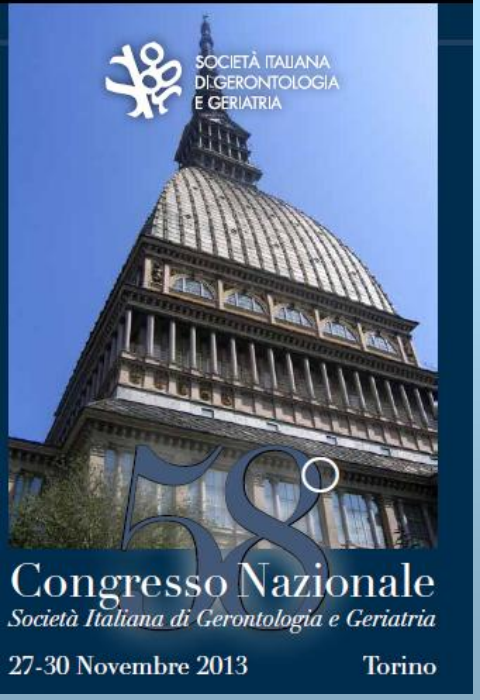
2013 ESH/ESC Guidelines for the management of arterial hypertension

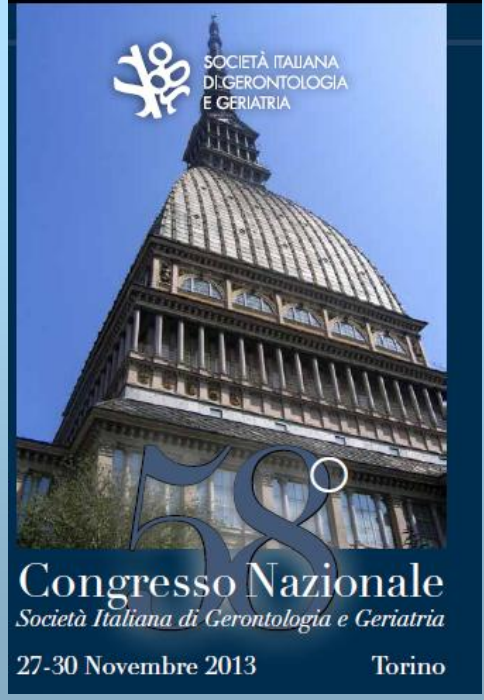
The Task Force for the management of arterial hypertension of the European Society of Hypertension (ESH) and of the European Society of Cardiology (ESC)

Authors/Task Force Members: Giuseppe Mancia (Chairperson) (Italy)*, Robert Fagard (Chairperson) (Belgium)*, Krzysztof Narkiewicz (Section co-ordinator) (Poland), Josep Redon (Section co-ordinator) (Spain), Alberto Zanchetti (Section co-ordinator) (Italy), Michael Böhm (Germany), Thierry Christiaens (Belgium), Renata Cifkova (Czech Republic), Guy De Backer (Belgium), Anna Dominiczak (UK), Maurizio Galderisi (Italy), Diederick E. Grobbee (Netherlands), Tiny Jaarsma (Sweden), Paulus Kirchhof (Germany/UK), Sverre E. Kjeldsen (Norway), Stéphane Laurent (France), Athanasios J. Manolis (Greece), Peter M. Nilsson (Sweden), Luis Miguel Ruilope (Spain), Roland E. Schmieder (Germany), Per Anton Sirnes (Norway), Peter Sleight (UK), Margus Viigimaa (Estonia), Bernard Waeber (Switzerland), Faiez Zannad (France)

Journal of Hypertension 2013, **31**:1925-1938

“Elderly” citato 22 volte





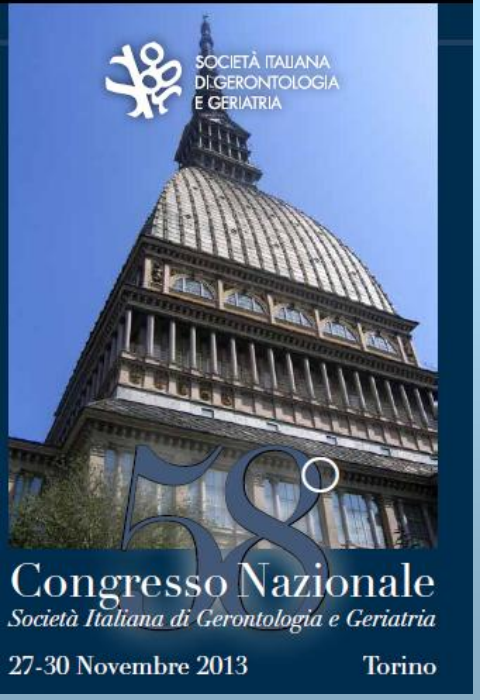
La definizione

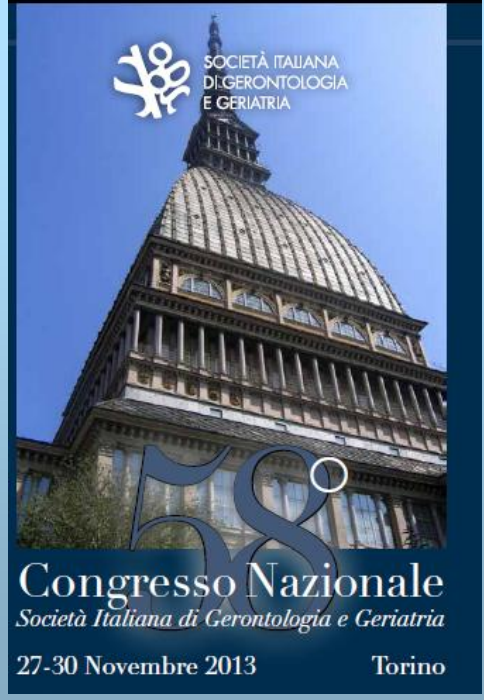
Definitions and classification of office blood pressure levels (mmHg)[a]

Category	Systolic		Diastolic
Optimal	<120	and	<80
Normal	120–129	and/or	80–84
High normal	130–139	and/or	85–89
Grade 1 hypertension	140–159	and/or	90–99
Grade 2 hypertension	160–179	and/or	100–109
Grade 3 hypertension	≥180	and/or	≥110
Isolated systolic hypertension	≥140	and	<90

[a]The blood pressure (BP) category is defined by the highest level of BP, whether systolic or diastolic. Isolated systolic hypertension should be graded 1, 2, or 3 according to systolic BP values in the ranges indicated.

Indipendentemente dall'età





La stratificazione del rischio

2013 ESH/ESC Guidelines for the management of arterial hypertension

Other risk factors, asymptomatic organ damage or disease	Blood Pressure (mmHg)			
	High normal SBP 130–139 or DBP 85–89	Grade 1 HT SBP 140–159 or DBP 90–99	Grade 2 HT SBP 160–179 or DBP 100–109	Grade 3 HT SBP ≥180 or DBP ≥110
No other RF		Low risk	Moderate risk	High risk
1–2 RF	Low risk	Moderate risk	Moderate to high risk	High risk
≥3 RF	Low to Moderate risk	Moderate to high risk	High Risk	High risk
OD, CKD stage 3 or diabetes	Moderate to high risk	High risk	High risk	High to very high risk
Symptomatic CVD, CKD stage ≥4 or diabetes with OD/RFs	Very high risk	Very high risk	Very high risk	Very high risk

AGE ≥55 years in men and ≥65 years in women is a risk factor

Dati relativi alla popolazione anziana (età 65-74 anni) in Italia:

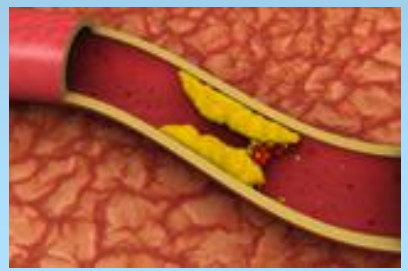
IPERCOLESTEROLEMIA

VALORI MEDI: ♂ 204 mg/dl ♀ 218 mg/dl

200-239 mg/dl: ♂ 36% ♀ 38%

>240 mg/dl: ♂ 24% ♀ 39%

→ ♂ **60%** ♀ **77%**



2013 ESH/ESC Guidelines for the management of arterial hypertension

Table 4 Factors—other than office BP—influencing prognosis; used for stratification of total CV risk

Asymptomatic organ damage
Pulse pressure (in the elderly) ≥60 mmHg
Electrocardiographic LVH (Sokolow–Lyon index >3.5 mV; RaVL >1.1 mV; Cornell voltage duration product >244 mV*ms), or
Echocardiographic LVH [LVM index: men >115 g/m^2; women >95 g/m^2 (BSA)][a]
Carotid wall thickening (IMT >0.9 mm) or plaque
Carotid–femoral PWV >10 m/s
Ankle-brachial index <0.9
CKD with eGFR 30–60 mL/min/1.73 m^2 (BSA)
Microalbuminuria (30–300 mg/24 h), or albumin–creatinine ratio (30–300 mg/g; 3.4–34 mg/mmol) (preferentially on morning spot urine)

Journal of the American College of Cardiology
© 2000 by the American College of Cardiology
Published by Elsevier Science Inc.

Vol. 36, No. 1, 2000
ISSN 0735-1097/00/$20.00
PII S0735-1097(00)00687-2

Risk Factors

Pulse Pressure and Risk for Myocardial Infarction and Heart Failure in the Elderly

Viola Vaccarino, MD, PHD,* Theodore R. Holford, PHD,* Harlan M. Krumholz, MD, FACC*†
New Haven, Connecticut

Table 1. Mean Pulse Pressure According to Level of Baseline Variables

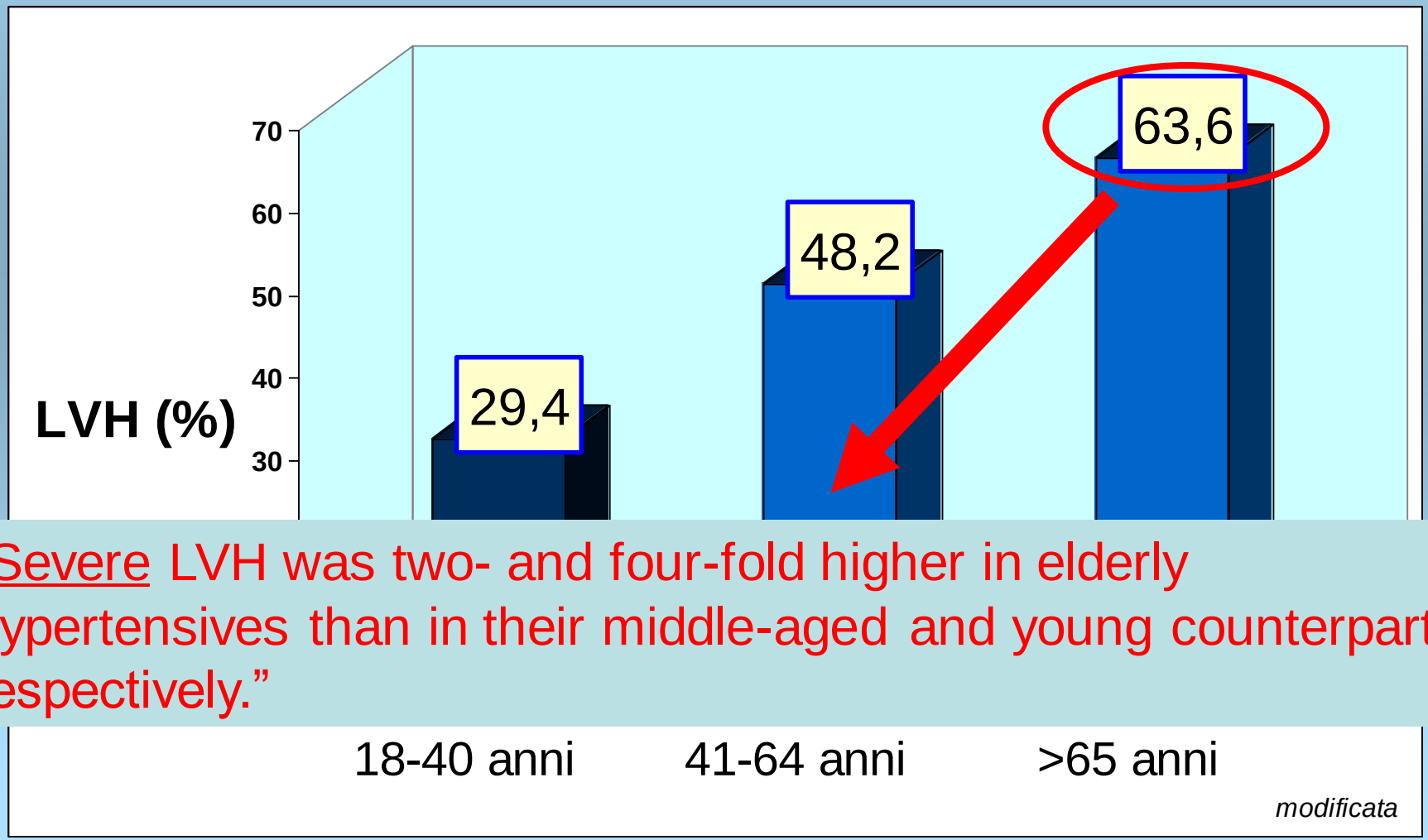
	n	Pulse Pressure (mean, ± SE)	p Value
Age			
65–74	1,253	61.4 ± 0.5	< 0.0001
75–84	705	66.6 ± 0.9	
≥85	193	74.0 ± 1.9	
Gender			
Men	844	63.0 ± 0.6	0.08
Women	1,309	64.6 ± 0.5	
Hypertension classification			
No Hypertension (SBP < 140 and DBP < 90 mm Hg)	947	53.6 ± 0.4	*
Stage I (SBP 140–159 or DBP 90–99 mm Hg)	734	65.5 ± 0.5	< 0.0001†
Stage II–III (SBP ≥ 160 or DBP ≥ 100 mm Hg)	472	84.3 ± 0.9	< 0.0001†

Blood Press. 2012 Jun;21(3):139-45. doi: 10.3109/08037051.2012.668662. Epub 2012 Mar 15.

Age related prevalence of severe left ventricular hypertrophy in essential hypertension: echocardiographic findings from the ETODH study.

Cuspidi C, Meani S, Sala C, Valerio C, Negri F, Mancia G.

Department of Clinical Medicine and Prevention, University of Milano-Bicocca, Milan, Italy. cesare.cuspidi@unimib.it



"Severe LVH was two- and four-fold higher in elderly hypertensives than in their middle-aged and young counterparts, respectively."

modificata

Guidelines

2007 Guidelines for the Management of Arterial Hypertension

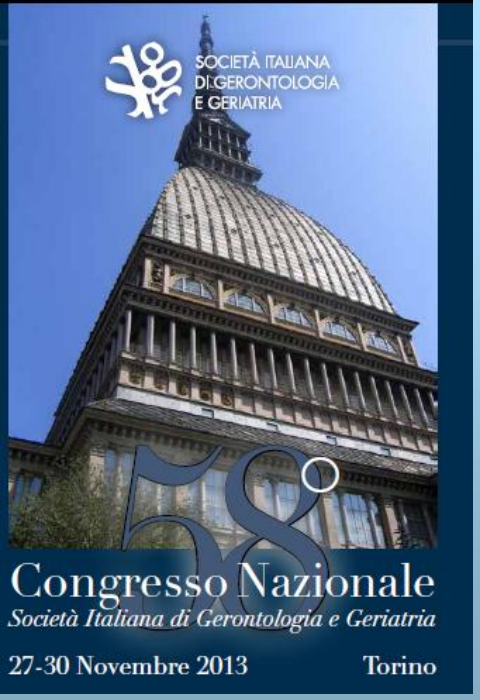
The Task Force for the Management of Arterial Hypertension of the European Society of Hypertension (ESH) and of the European Society of Cardiology (ESC)

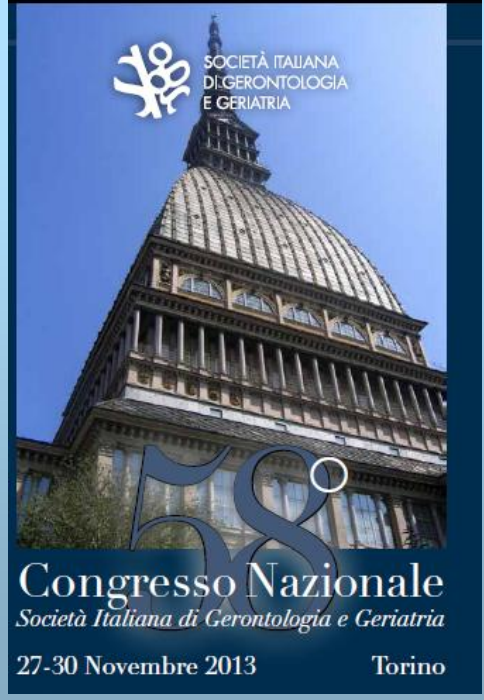
Praticamente non

2013 ESH/ESC Guidelines:

"Many elderly men (e.g. .70 years) reach a high total risk level whilst being at very little increased risk relative to their peers."

"almeno" soggetti a rischio medio - elevato

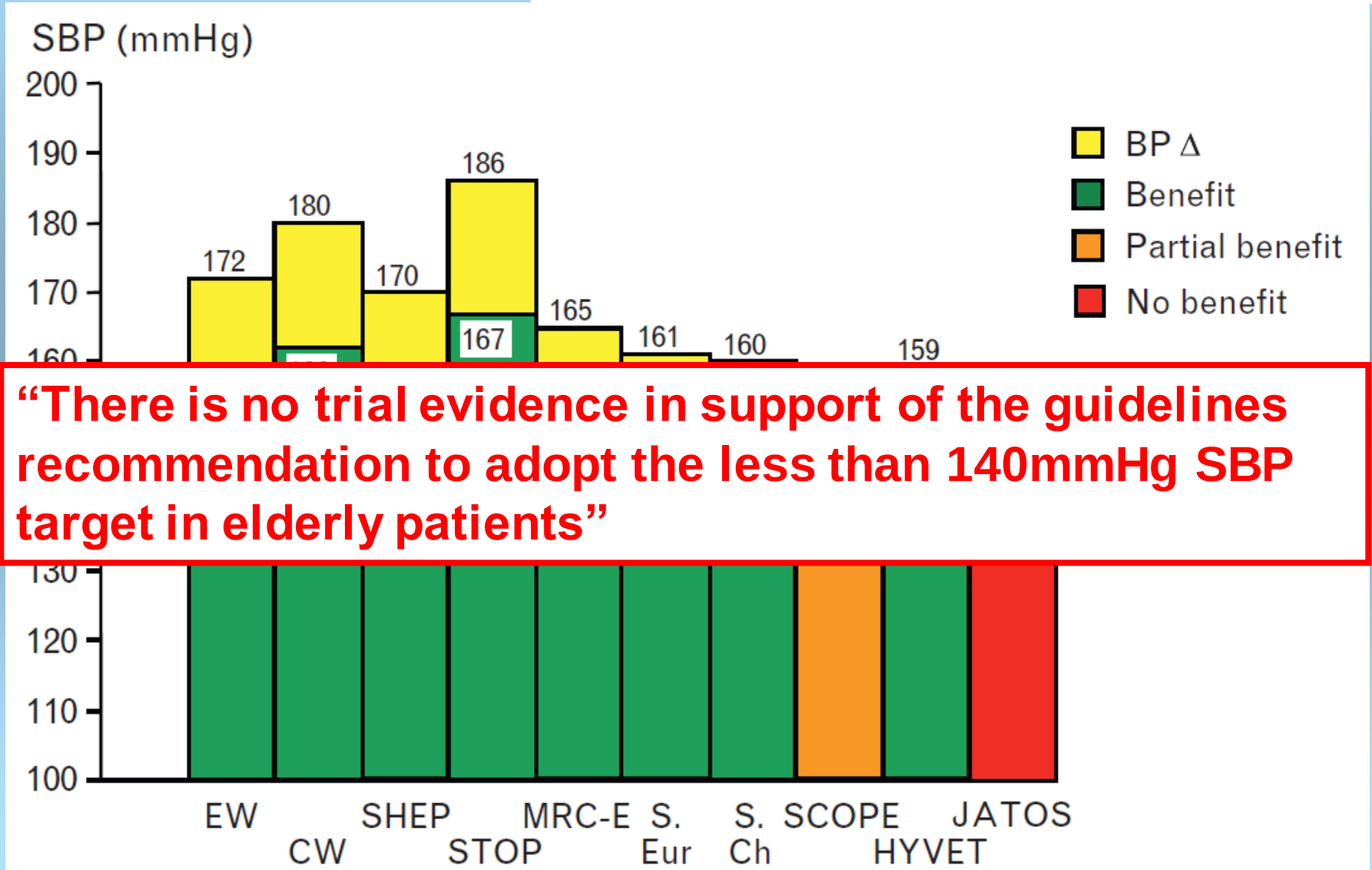




Il trattamento: chi e come?

Reappraisal of European guidelines on hypertension management: a European Society of Hypertension Task Force document

Journal of Hypertension 2009, **27**:000-000



"There is no trial evidence in support of the guidelines recommendation to adopt the less than 140mmHg SBP target in elderly patients"

Journal of the American College of Cardiology
© 2011 by the American College of Cardiology Foundation and the American Heart Association, Inc.
Published by Elsevier Inc.
Vol. 57, No. 20, 2011
ISSN 0735-1097/$36.00
doi:10.1016/j.jacc.2011.01.008

EXPERT CONSENSUS DOCUMENT

ACCF/AHA 2011 Expert Consensus Document on Hypertension in the Elderly

A Report of the American College of Cardiology Foundation Task Force on Clinical Expert Consensus Documents

Developed in Collaboration With the American Academy of Neurology, American Geriatrics Society, American Society for Preventive Cardiology, American Society of Hypertension, American Society of Nephrology, Association of Black Cardiologists, and European Society of Hypertension

"The general recommended BP goal in uncomplicated hypertension is <140/90 mmHg. However, this target for elderly hypertensive patients is based on expert opinion rather than on data from randomized controlled trials (RCTs)"

"It is unclear whether target SBP should be the same in patients 65 to 79 years of age as in patients >80 years of age"

2013 ESH/ESC Guidelines for the management of arterial hypertension

The Task Force for the management of arterial hypertension of the European Society of Hypertension (ESH) and of the European Society of Cardiology (ESC)

Authors/Task Force Members: Giuseppe Mancia (Chairperson) (Italy)*, Robert Fagard (Chairperson) (Belgium)*, Krzysztof Narkiewicz (Section co-ordinator) (Poland), Josep Redon (Section co-ordinator) (Spain), Alberto Zanchetti (Section co-ordinator) (Italy), Michael Böhm (Germany), Thierry Christiaens (Belgium), Renata Cifkova (Czech Republic), Guy De Backer (Belgium), Anna Dominiczak (UK), Maurizio Galderisi (Italy), Diederick E. Grobbee (Netherlands), Tiny Jaarsma (Sweden), Paulus Kirchhof (Germany/UK), Sverre E. Kjeldsen (Norway), Stéphane Laurent (France), Athanasios J. Manolis (Greece), Peter M. Nilsson (Sweden), Luis Miguel Ruilope (Spain), Roland E. Schmieder (Germany), Per Anton Sirnes (Norway), Peter Sleight (UK), Margus Viigimaa (Estonia), Bernard Waeber (Switzerland), Faiez Zannad (France)

elderly patient

should be considered when a treated individual becomes octogenarian.	IIa	C	-
All hypertensive agents are recommended and can be used in the elderly, although diuretics and calcium antagonists may be preferred in isolated systolic hypertension.	I	A	444, 449, 451, 452

SBP between 140 and 150 mmHg

“good physical and mental condition”

“FIT” elderly patient

?

Antihypertensive treatment strategies in the elderly

Recommendations	Class [a]	Level [b]	Ref. [c]
In elderly hypertensives with SBP ≥160 mmHg there is solid evidence to recommend reducing SBP to between 150 and 140 mmHg.	I	A	141, 265
In fit elderly patients <80 years old antihypertensive treatment may be considered at SBP values ≥140 mmHg with a target SBP <140 mmHg if treatment is well tolerated.	IIb	C	-
In individuals older than 80 years with an initial SBP ≥160 mmHg it is recommended to reduce SBP to between 150 and 140 mmHg, provided they are in good physical and mental conditions.	I	B	287
I ents, it is eave decisions e therapy to an, and based he clinical t.	I	C	-
Continuation of well-tolerated antihypertensive treatment should be considered when a treated individual becomes octogenarian.	IIa	C	-
All hypertensive agents are recommended and can be used in the elderly, although diuretics and calcium antagonists may be preferred in isolated systolic hypertension.	I	A	444, 449, 451, 452

.95 Km)

Determinanti dello stato di salute nell'anziano (Valutazione multidimensionale)

Quaderni del Ministero della Salute

ISSN 2038-5293

6

n. 6, novembre-dicembre 2010

Short Physical Performance Battery (SPPB)

- Include tre test:
  - **Test dell'equilibrio** (fino a 10 secondi per prova)
    - Piedi uniti
    - Semi-tandem
    - Tandem
  - **Test della marcia (4 m)**
  - **Test della sedia**
- Punteggio da 0 a 4 per ogni test
- **Punteggio totale: range 0-12**

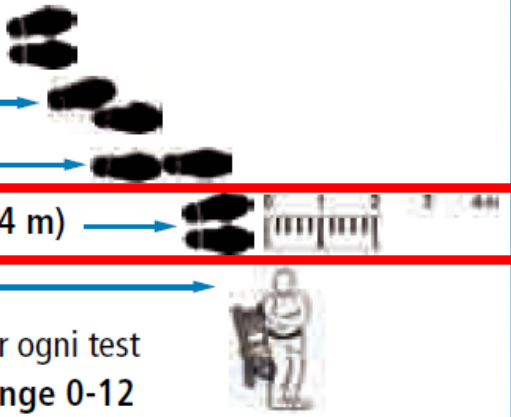


Figura 3.3 Nella *Short Physical Performance Battery* (SPPB) il punteggio si ricava dall'appartenenza a uno dei quartili per ciascun test (modificata graficamente da Guralnik, 1994).

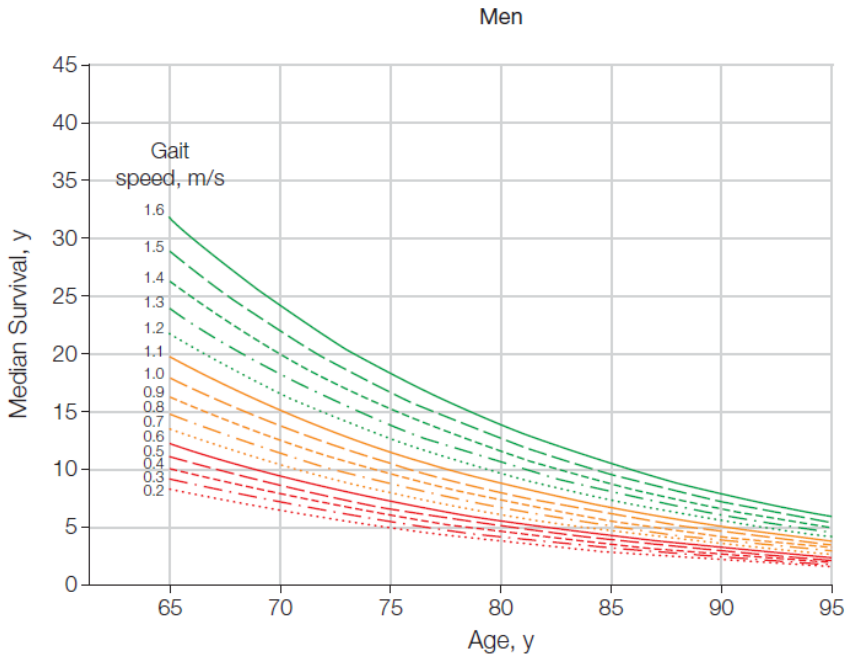
Tabella 3.3 Relazione tra *Short Physical Performance Battery* (SPPB) e mortalità in una popolazione non istituzionalizzata (modificata graficamente da Di Bari, 2006)

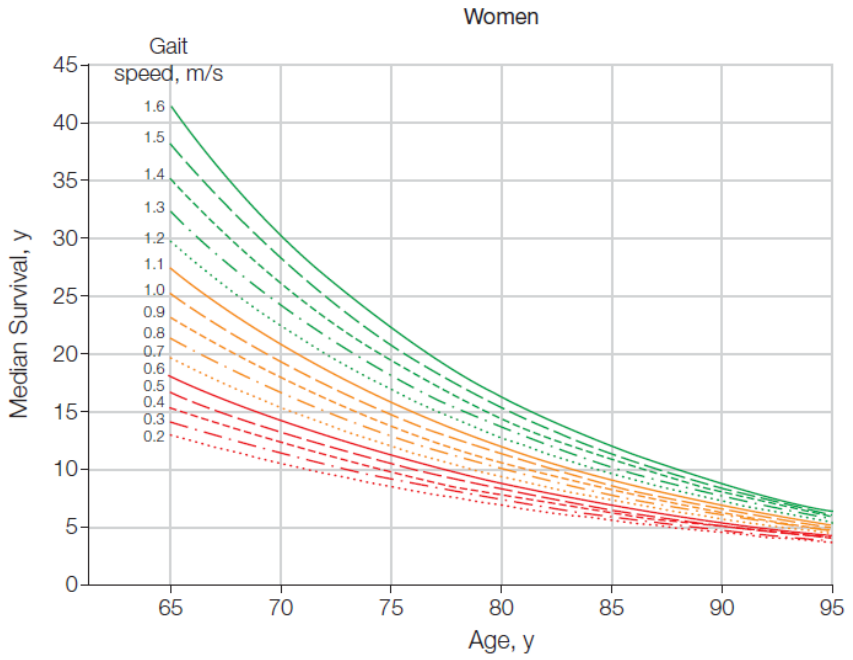
Modelli e variabili	*Hazard ratio* (IC 95%)	p
Modello 1		
Malattia		0,01
Livello 1	1	
Livello 2	1,4 (0,9-2,4)	0,16
Livello 3	1,6 (1,0-2,5)	0,048
Livello 4	2,2 (1,4-3,6)	0,001
Età	1,12 (1,11-1,15)	< 0,001
Sesso (femmine *vs* maschi)	0,5 (0,4-0,7)	< 0,001
SPPB score	0,02 (0,88-0,07)	0,002

ORIGINAL CONTRIBUTION

JAMA, January 5, **2011**—Vol 305, No. 1

Gait Speed and Survival in Older Adults





Stefania Bandinelli, MD
Tamara Harris, MD
Anne B. Newman, MD
Jane Cauley, PhD
Luigi Ferrucci, MD, PhD
Jack Guralnik, MD, PhD

en. Predicted survival based on age, sex, and gait speed was as accurate as predicted based on age, sex, use of mobility aids, and self-reported function or as age, sex, chronic conditions, smoking history, blood pressure, body mass index, and hospitalization.

Conclusion In this pooled analysis of individual data from 9 selected cohorts, gait speed was associated with survival in older adults.

JAMA. 2011;305(1):50-58 www.jama.com

ORIGINAL INVESTIGATION

Rethinking the Association of High Blood Pressure With Mortality in Elderly Adults

The Impact of Frailty

Michelle C. Odden, PhD; Carmen A. Peralta, MD, MAS; Mary N. Haan, DrPH; Kenneth E. Covinsky, MD, MPH

Background: The association of hypertension and mortality is attenuated in elderly adults. Walking speed, as a measure of frailty, may identify which elderly adults are most at risk for the adverse effects of hypertension. We hypothesized that elevated blood pressure (BP) would be associated with a greater risk of mortality in faster-, but not slower-, walking older adults.

Methods: Participants included 2340 persons 65 years and older in the National Health and Nutrition Examination Survey, 1999-2000 and 2001-2002. Mortality data were linked to death certificates in the National Death Index. Walking speed was measured over a 20-ft (6 m) walk and classified as faster (≥0.8 m/s [n=1307]), slower (n=790), or incomplete (n=243). Potential confounders included age, sex, race, survey year, lifestyle and physiologic variables, health conditions, and antihypertensive medication use.

Results: Among the participants, there were 589 deaths through December 31, 2006. The association between BP and mortality varied by walking speed. Among faster walkers, those with elevated systolic BP (≥140 mm Hg) had a greater adjusted risk of mortality compared with those without (hazard ratio [HR], 1.35; 95% CI, 1.03-1.77). Among slower walkers, neither elevated systolic nor diastolic BP (≥90 mm Hg) was associated with mortality. In participants who did not complete the walk test, elevated BP was strongly and independently associated with a lower risk of death: HR, 0.38; 95% CI, 0.23-0.62 (systolic); and HR, 0.10; 95% CI, 0.01-0.81 (diastolic).

Conclusions: Walking speed could be a simple measure to identify elderly adults who are most at risk for adverse outcomes related to high BP.

Arch Intern Med. 2012;172(15):1162-1168.
Published online July 16, 2012.
doi:10.1001/archinternmed.2012.2555

Arch Intern Med. 2012;172(15):1162-1168.

National Health and Nutrition Examination Survey (NHANES)

- Campione di 2340 soggetti (età >65 anni)
- Dati di mortalità incrociati con i certificati di morte del National Death Index (NDI) dal 1999-2002 fino al 31 dicembre 2006; 589/2340 pazienti deceduti
- Cut-off velocità di cammino: >0,8 m/s. Cut-off PA: 140/90 mmHg.

- Fast walkers 56% - Slow walkers: 34%
- 243 partecipanti (10%) non hanno portato a termine il test del cammino

"21 safety exclusion, 22 participant refusal, 69 no time/came late/left early, 77 physical limitation, 13 ill/emergency, 36 other reasons, and 5 were missing an explanation."

Dati corretti per anno di arruolamento, età, sesso, razza nera, scolarità, fumo, colesterolemia, coronaropatia, scompenso cardiaco e ictus.

Table 3. The Association of Elevated BP and Mortality, Across Strata of Walking Speed, in NHANES Participants 65 Years and Older (1999-2002)

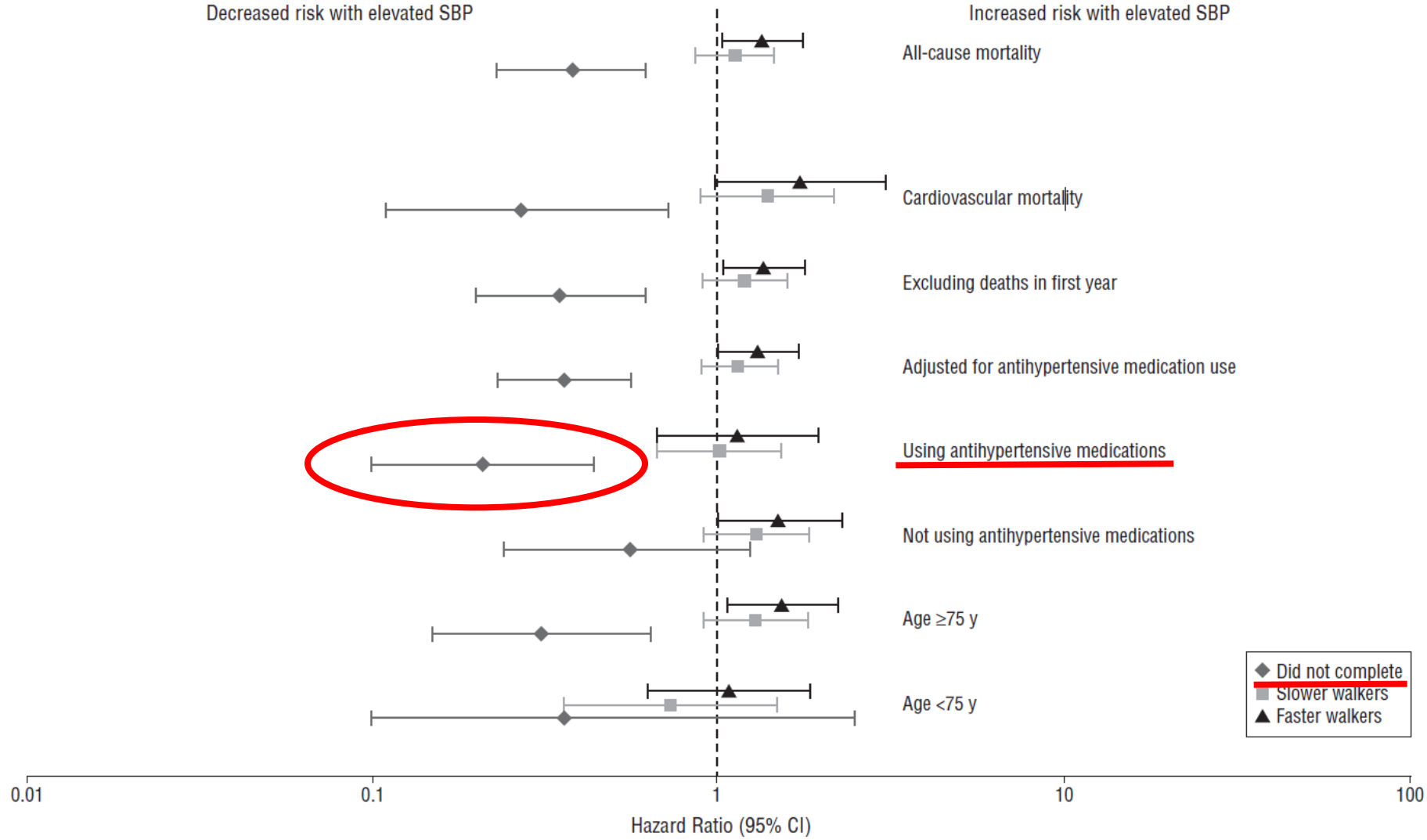
BP	Walking Speed		
	Faster ≥0.8 m/s (n = 1307)	Slower <0.8 m/s (n = 790)	Did Not Complete (n = 243)
Systolic BP			
Mortality rate per 1000 person-years			
≥140 mm Hg	28.1	72.1	62.4
<140 mm Hg[a]	20.4	67.6	133.5
Rate difference	7.7	4.5	–71.1
Unadjusted HR (95% CI)[b,c]	1.39 (0.98-1.96)	1.06 (0.84-1.34)	0.47 (0.29-0.73)
Adjusted HR (95% CI)[b,c]	1.35 (1.03-1.77)	1.12 (0.87-1.45)	0.38 (0.23-0.62)
Diastolic BP			
Mortality rate, per 1000 person-years			
≥90 mm Hg	24.6	42.5	8.4
<90 mm Hg[a]	23.5	71.3	95.6
Rate difference	0.5	–28.8	–87.2
Unadjusted HR (95% CI)[b,c]	1.01 (0.49-2.07)	0.60 (0.26-1.40)	0.09 (0.01-0.62)
Adjusted HR (95% CI)[b,c]	0.94 (0.38-2.28)	0.75 (0.32-1.75)	0.10 (0.01-0.81)

1,35, p=0,03 **p= NS** **0,38, p <0,001**

Analisi aggiustata per età, sesso, razza, scolarità, fumo, colesterolemia, coronaropatia, scompenso cardiaco, stroke

Arch Intern Med. 2012;172(15):1162-1168.

Arch Intern Med. 2012;172(15):1162-1168.



In chi non completa il test della marcia c'è una relazione inversa fra valori pressori e mortalità, specie nel sottogruppo di chi assume terapia anti-ipertensiva

FRAIL

elderly patient

Antihypertensive treatment strategies in the elderly

Recommendations	Class [a]	Level [b]	Ref. [c]
In elderly hypertensives with SBP ≥160 mmHg there is solid evidence to recommend reducing SBP to between 150 and 140 mmHg.	I	A	141, 265
In fit elderly patients <80 years old antihypertensive treatment may be considered at SBP values ≥140 mmHg with a target SBP <140 mmHg if treatment is well tolerated.	IIb	C	-
In individuals older than 80 years with an initial SBP ≥160 mmHg it is recommended to reduce SBP to between 150 and 140 mmHg, provided they are in good physical and mental conditions.	I	B	287
In frail elderly patients, it is recommended to leave decisions on antihypertensive therapy to the treating physician, and based on monitoring of the clinical effects of treatment.	I	C	-
Continuation of well-tolerated antihypertensive treatment should be considered when a treated individual becomes octogenarian.	IIa	C	-
All hypertensive agents are recommended and can be used in the elderly, although diuretics and calcium antagonists may be preferred in isolated systolic hypertension.	I	A	444, 449, 451, 452

JAMDA 13 (2012) 760.e1–760.e5

JAMDA

Table 2
Baseline Features of Survived and Deceased Subjects

	Survived (n = 79)	Deceased (n = 21)	*P*
Age, y	82 ± 9	85 ± 10	.292
Females	53 (67)	11 (52)	.212
Smoke, present or previous	26 (33)	6 (29)	.705
Barthel Index, %	44 ± 35	17 ± 28	.001
MMSE	16.5 ± 9.8	8.6 ± 10.8	.001
NPI	7.4 ± 7.9	13.3 ± 8.5	.008
Charlson Index	5.1 ± 1.6	6.2 ± 1.5	.004
AH, n (%)	39 (49)	12 (57)	.526
Antihypertensive, n (%)	47 (60)	17 (81)	.069
History of falls, n (%)	43 (54)	6 (29)	.035
No. of drugs	3.5 ± 1.7	3.5 ± 1.4	.868
Diabetes mellitus, n (%)	8 (10)	4 (19)	.263
TIA/Stroke, n (%)	31(39)	7 (33)	.620
CAD, n (%)	11 (14)	6 (29)	.112
CHF, n (%)	13 (17)	7 (33)	.086

AH, arterial hypertension; BMI, body mass index; CAD, coronary artery disease; CHF, chronic heart failure; MMSE, Mini Mental State Examination; NPI, Neuropsychiatric Inventory; TIA, transient ischemic attack.

associated with blood pressure values.

Copyright © 2012 - American Medical Directors Association, Inc.

Ambulatory Blood Pressure Monitoring in Older Nursing Home Residents: Diagnostic and Prognostic Role

Enrico Mossello MD, PhD *, Maria Chiara Pieraccioli MD, Samanta Zanieri MD, Angela Fedeli MD, Maddalena Belladonna MD, Nicola Nesti MD, Niccolò Marchionni MD, Giulio Masotti MD, Andrea Ungar MD, PhD

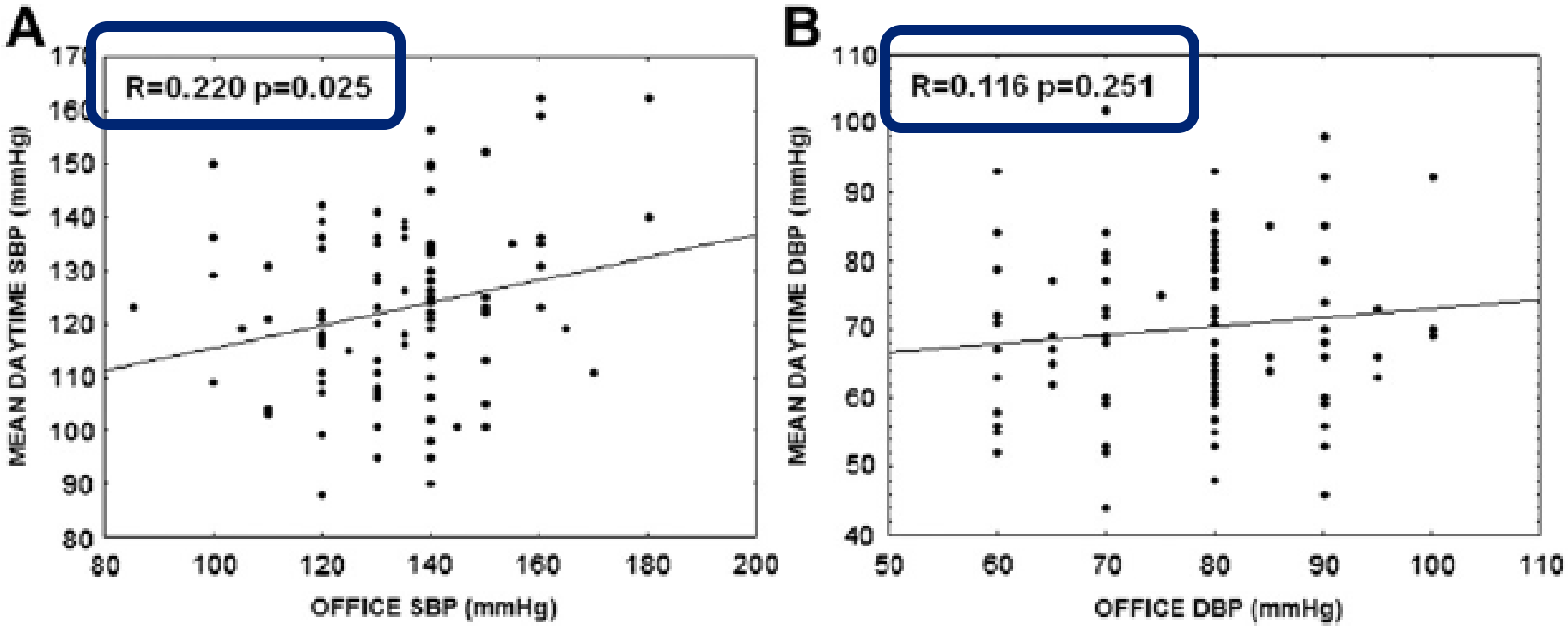


Fig. 1. Correlation between Office and ABPM Values for SBP (A) and DBP (B).

Ambulatory Blood Pressure Monitoring in Older Nursing Home Residents: Diagnostic and Prognostic Role

Enrico Mossello MD, PhD *, Maria Chiara Pieraccioli MD, Samanta Zanieri MD, Angela Fedeli MD, Maddalena Belladonna MD, Nicola Nesti MD, Niccolò Marchionni MD, Giulio Masotti MD, Andrea Ungar MD, PhD

…. among subjects with normal office BP values the prevalence of masked hypertension was 26% and among subjects with elevated office BP values **the prevalence of white coat hypertension (WCH) was 70%**.

….. **61% of subjects with WCH actually received antihypertensive treatment** in the present study, thus suggesting a potential overtreatment.

Table 2
Baseline Features of Survived and Deceased Subjects

	Survived (n = 79)	Deceased (n = 21)	*P*
Age, y	82 ± 9	85 ± 10	.292
Females	53 (67)	11 (52)	.212
Smoke, present or previous	26 (33)	6 (29)	.705
Barthel Index, %	44 ± 35	17 ± 28	.001
MMSE	16.5 ± 9.8	8.6 ± 10.8	.001
NPI	7.4 ± 7.9	13.3 ± 8.5	.008
Charlson Index	5.1 ± 1.6	6.2 ± 1.5	.004
AH, n (%)	39 (49)	12 (57)	.526
Antihypertensive, n (%)	47 (60)	17 (81)	.069
History of falls, n (%)	43 (54)	6 (29)	.035
No. of drugs	3.5 ± 1.7	3.5 ± 1.4	.868
Diabetes mellitus, n (%)	8 (10)	4 (19)	.263
TIA/Stroke, n (%)	31(39)	7 (33)	.620
CAD, n (%)	11 (14)	6 (29)	.112
CHF, n (%)	13 (17)	7 (33)	.086

AH, arterial hypertension; BMI, body mass index; CAD, coronary artery disease; CHF, chronic heart failure; MMSE, Mini Mental State Examination; NPI, Neuropsychiatric Inventory; TIA, transient ischemic attack.

Journal of the American Medical Directors Association

Volume 13, Issue 8, October 2012, Pages 760.e1–760.e5

Original Study

Ambulatory Blood Pressure Monitoring in Older Nursing Home Residents: Diagnostic and Prognostic Role

Enrico Mossello, MD, PhD, Maria Chiara Pieraccioli, MD, Samanta Zanieri, MD, Angela Fedeli, MD, Maddalena Belladonna, MD, Nicola Nesti, MD, Niccolò Marchionni, MD, Giulio Masotti, MD, Andrea Ungar, MD, PhD

Division of Geriatric Medicine and Cardiology, University of Florence and Careggi Teaching Hospital, Florence, Italy

Survival at 1-year follow-up is predicted by disability and behavioral disorders, but is not associated with blood pressure values.“

	OR	CI 95%	p
Barthel Index	0.976	0.959-0.996	0.018
Neuropsychiatric Inventory	1.062	1.001-1.127	0.048
Night-time SBP SD	0.877	0.764-1.006	0.061

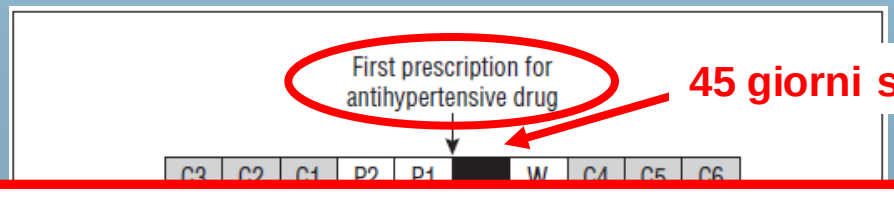
ORIGINAL INVESTIGATION

ONLINE FIRST

The Risk of Hip Fracture After Initiating Antihypertensive Drugs in the Elderly

Debra A. Butt, MD, MSc, CCFP, FCFP; Muhammad Mamdani, PharmD, MPH; Peter C. Austin, PhD; Karen Tu, MD, MSc, CCFP, FCFP; Tara Gomes, MHSc; Richard H. Glazier, MD, MPH, CCFP, FCFP

Arch Intern Med.
Published online November 19, 2012.
doi:10.1001/2013.jamainternmed.469



45 giorni successivi

Ontario Drug Benefit Program

rischio di frattura di femore: **+43%**

(IRR, 1.43; 95% CI, 1.19-1.72)

nei primi 45 giorni dopo l'inizio della terapia anti-ipertensiva

prescription. All patients in the analysis had at least 1 prescription for an antihypertensive drug and a single incident hip fracture.

Causes of Syncope in general population (EGSYS 2) and in geriatric departments (GIS)

	EGSYS 2*	GIS**		
	All (n=465)	**65-75 years (n=71)**	**> 75 years (n=160)**	**p***
	n (%)	n (%)	n (%)	
Cardiac	74 (16)	8 (11.3)	26 (16.3)	ns
Neuromediated	309 (66)	44 (62)	58 (36.3)	0,001
Orthostatic	46 (10)	3 (4.2)	49 (30.5)	0,001
Cerebrovas		0	0	/
Drug Induc		3 (4.2)	8 (5)	ns
Unexplained	11 (2)	10 (14.1)	14 (8.8)	ns

In Older patients Orthostatic Hypotension must be evaluated in all patients

* <75 years vs >75 years GIS

* Brignole M et al, Eur Heart J. 2006; 27:76-82

** Ungar A et al, JAGS 2006; 54: 1531-1536

Journal of Gerontology: MEDICAL SCIENCES
Cite journal as: J Gerontol A Biol Sci Med Sci
doi:10.1093/gerona/glp028

© The Author 2009. Published by Oxford University Press on behalf of The Gerontological Society of America.
All rights reserved. For permissions, please e-mail: journals.permissions@oxfordjournals.org.

Orthostatic Hypotension As Cause of Syncope in Patients Older Than 65 Years Admitted to Emergency Departments for Transient Loss of Consciousness

Chiara Mussi,[1] Andrea Ungar,[2] Gianfranco Salvioli,[1] Carlo Menozzi,[3] Angelo Bartoletti,[4] Franco Giada,[5] Alfonso Lagi,[6] Irene Ponassi,[7] Giuseppe Re,[8] Raffaello Furlan,[9] Roberto Maggi,[10] and Michele Brignole,[10] for the Evaluation of Guidelines in Syncope Study 2 Group*

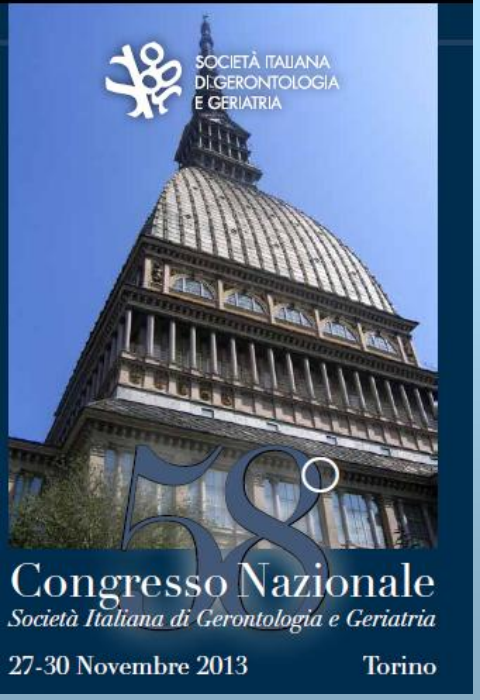
Table 3. Multivariate Analysis

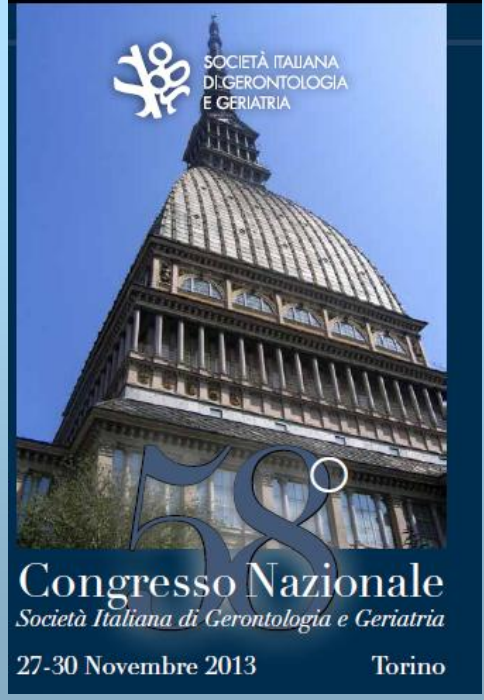
	OR	95% CI	*p*
Parkinson's disease	10.91	2.645–45.05	.001
Use of diuretics	3.73	1.23–11.28	.020
Use of nitrates	5.20	1.99–13.61	.001

Note: Other variables included in the model: age, sex, ischemic heart disease, hypertension, hypertensive heart disease, valvular heart disease, myocardiopathy, other cardiac diseases, diabetes, ischemic cerebral diseases, other neurological diseases, electrocardiographic findings, type of drugs, daily dosage. CI = confidence interval; OR = odds ratio.

Table 5 Office blood pressure measurement

When measuring BP in the office, care should be taken:
• To allow the patients to sit for 3–5 minutes before beginning BP measurements.
• To take at least two BP measurements, in the sitting position, spaced 1–2 min apart, and additional measurements if the first two are quite different. Consider the average BP if deemed appropriate.
• To take repeated measurements of BP to improve accuracy in patients with arrhythmias, such as atrial fibrillation.
• To use a standard bladder (12–13 cm wide and 35 cm long), but have a larger and a smaller bladder available for large (arm circumference >32 cm) and thin arms, respectively.
• To have the cuff at the heart level, whatever the position of the patient.
• When adopting the auscultatory method, use phase I and V (disappearance) Korotkoff sounds to identify systolic and diastolic BP, respectively.
• To measure BP in both arms at first visit to detect possible differences. In this instance, take the arm with the higher value as the reference.
• To measure at the first visit, BP 1 and 3 min after assumption of the standing position in elderly subjects, diabetic patients, and in other conditions in which orthostatic hypotension may be frequent or suspected.
• To measure, in case of conventional BP measurement, heart rate by pulse palpation (at least 30 s) after the second measurement in the sitting position.





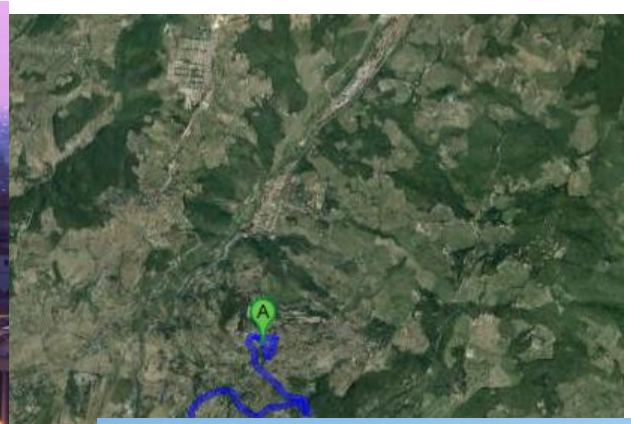
La compliance

Representativeness of the “Fiesole Misurata” study database for use in pharmaco-epidemiological investigations on adherence to antihypertensive medications

Francesco Lapi · Ersilia Lucenteforte · Martina Moschini · Roberto Bonaiuti · Marina Di Pirro · Alessandro Barchielli · Silvia Benemei · Maddalena Belladonna · Nicola Nesti · Raffaele Coppini · Margherita Taras · Alfredo Vannacci · Andrea Ungar · Alessandro Mugelli

Representativeness of the “Fiesole Misurata” study database for use in pharmaco-epidemiological investigations on adherence to antihypertensive medications

Francesco Lapi · Ersilia Lucenteforte · Martina Moschini · Roberto Bonaiuti · Marina Di Pirro · Alessandro Barchielli · Silvia Benemei · Maddalena Belladonna · Nicola Nesti · Raffaele Coppini · Margherita Taras · Alfredo Vannacci · Andrea Ungar · Alessandro Mugelli



a - Fiesole

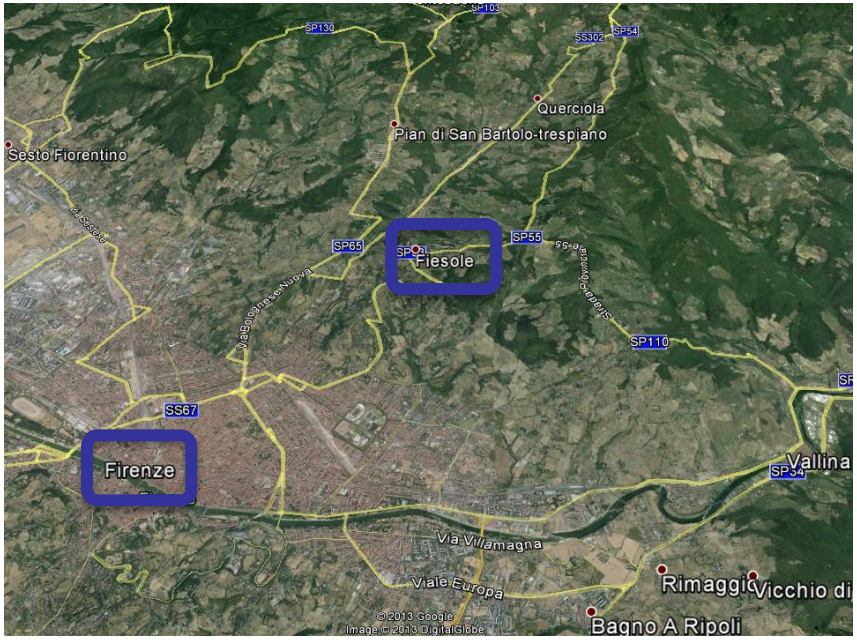
B - Firenze

Aging Clin Exp Res
DOI 10.1007/s40520-013-0060-7

ORIGINAL ARTICLE

Representativeness of the "Fiesole Misurata" study database for use in pharmaco-epidemiological investigations on adherence to antihypertensive medications

Francesco Lapi · Ersilia Lucenteforte · Martina Moschini · Roberto Bonaiuti · Marina Di Pirro · Alessandro Barchielli · Silvia Benemei · Maddalena Belladonna · Nicola Nesti · Raffaele Coppini · Margherita Taras · Alfredo Vannacci · Andrea Ungar · Alessandro Mugelli



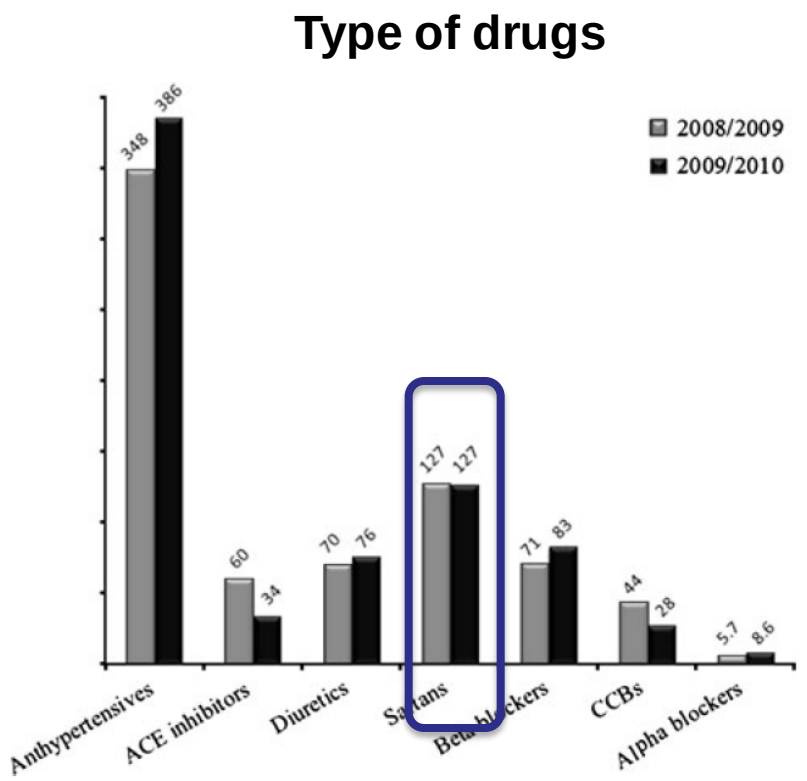


Fig. 1 Use of antihypertensives broken down by the period of use in the claim dataset (DDD/1,000 inhabitants/day). *ACE* angiotensin-converting enzyme, *CCBs* calcium channel blockers, *DDDs* drug daily dosages

Aging Clin Exp Res
DOI 10.1007/s40520-013-0060-7

ORIGINAL ARTICLE

Representativeness of the "Fiesole Misurata" study database for use in pharmaco-epidemiological investigations on adherence to antihypertensive medications

Francesco Lapi · Ersilia Lucenteforte · Martina Moschini · Roberto Bonaiuti · Marina Di Pirro · Alessandro Barchielli · Silvia Benemei · Maddalena Belladonna · Nicola Nesti · Raffaele Coppini · Margherita Taras · Alfredo Vannacci · Andrea Ungar · Alessandro Mugelli

Compliants

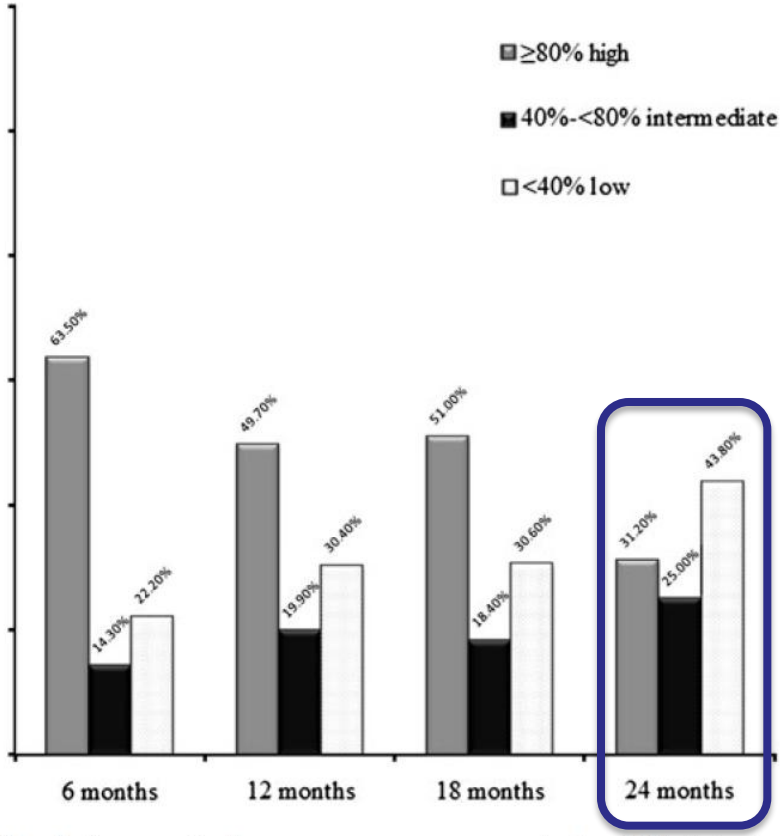
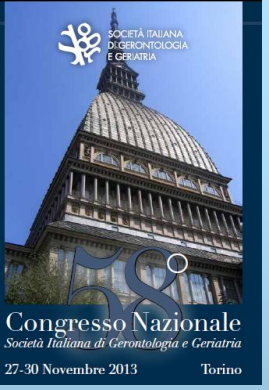
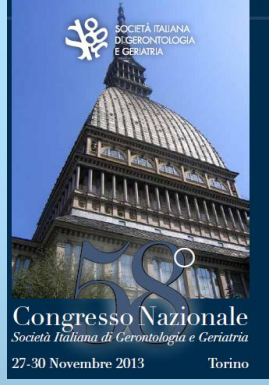


Fig. 2 Degree of adherence among new users in the AHT dataset





La stratificazione del rischio nell'anziano

Il trattamento: chi e come?

Frailty: velocità del cammino, fratture, ipot.ortostatica

Compliance

2013 ESH/ESC Guidelines for the management of arterial hypertension

The Task Force for the management of arterial hypertension of the European Society of Hypertension (ESH) and of the European Society of Cardiology (ESC)

Authors/Task Force Members: Giuseppe Mancia (Chairperson) (Italy)*, Robert Fagard (Chairperson) (Belgium)*, Krzysztof Narkiewicz (Section co-ordinator) (Poland), Josep Redon (Section co-ordinator) (Spain), Alberto Zanchetti (Section co-ordinator) (Italy), Michael Böhm (Germany), Thierry Christiaens (Belgium), Renata Cifkova (Czech Republic), Guy De Backer (Belgium), Anna Dominiczak (UK), Maurizio Galderisi (Italy), Diederick E. Grobbee (Netherlands), Tiny Jaarsma (Sweden), Paulus Kirchhof (Germany/UK), Sverre E. Kjeldsen (Norway), Stéphane Laurent (France), Athanasios J. Manolis (Greece), Peter M. Nilsson (Sweden), Luis Miguel Ruilope (Spain), Roland E. Schmieder (Germany), Per Anton Sirnes (Norway), Peter Sleight (UK), Margus Viigimaa (Estonia), Bernard Waeber (Switzerland), Faiez Zannad (France)

Journal of Hypertension 2013, **31**:1925-1938

Un Geriatra nella Task Force ??

Grazie per l’attenzione