

Supplemental Material

Table S1. Baseline characteristics of patients stratified according to the diagnosis STEMI vs NSTEMI.

	NSTEMI (n=350)	STEMI (n=769)	p-value
Age	67.5 (10.8)	65.8 (11.9)	0.04
Male sex (%)	69.7	73.3	0.21
BMI	26.2 [23.9 - 29.8]	26.2 [24.1 - 29.3]	0.74
SBP at admission (mmHg)	139.3 (23)	130.4 (22.7)	<0.01
DBP at admission (mmHg)	80 [70 - 90]	80 [70 - 85]	<0.01
Heart rate	74 [65 - 85]	75 [65 - 85]	0.16
Atrial fibrillation	10	5.9	0.01
Cardiac arrest (%)	3.7	4.3	0.65
Left bundle branch block (%)	7.4	2.6	<0.01
Killip II-IV	17.4	15.9	0.51
Hypertension (%)	74.6	59.2	<0.01
Diabetes mellitus (%)	26.6	20	0.01
Smoking (%)	41.4	48.8	0.02
Dyslipidemia (%)	63.7	47.8	<0.01
Positive family history for IHD (%)	24.3	19	0.04
Known GFR<60ml/min/1.73 m ² (%)	10.9	6.3	0.01
Peripheral artery disease (%)	7.4	4	0.02
Previous MI/PCI/CABG	28.6	11.7	<0.01
Anaemia at admission (%)	27.5	22.8	0.09
Total cholesterol (mg/dl)	181.2 (50)	192.7 (46.2)	<0.01
HDL cholesterol (mg/dl)	43 [36 - 52.3]	43 [36 - 51]	0.84
LDL cholesterol (mg/dl)	111 (41.8)	122.6 (39)	<0.01
Triglycerides (mg/dl)	113.5 [86 - 147]	112 [82.25 - 152]	0.81
TnI max (ng/l)	3580 [814 - 9670]	30885 [10155 - 76911.5]	<0.01
HbA1C (mmol/mol)	43 [38 - 49]	41 [37 - 48]	0.02
Na ⁺ at discharge (mEq/l)	139 [138 - 141]	139 [138 - 141]	0.04
Haemoglobin at discharge (g/dl)	12.38 (1.96)	12.75 (1.69)	<0.01
Creatinine at discharge (mg/dl)	0.9 [0.8 - 1.1]	1 [0.8 - 1.1]	0.97
GFR at discharge (ml/min)	76.3 [58.8 - 91.8]	82.1 [66 - 99]	<0.01
GFR<60 ml/min/1.73 m ² at discharge	10.9	6.3	<0.01
GRACE score at 6 months	121 (30.7)	137.1 (33.5)	<0.01
Left atrium area (cm ²)	4 (0.7)	3.8 (0.7)	<0.01
LVEDD_I	2.5 [2.3 - 2.8]	2.5 [2.3 - 2.7]	0.46
LVESD_I	1.7 [1.4 - 2]	1.7 [1.5 - 2]	0.58
LVEDV_I	50.6 [40.9 - 62.3]	49.8 [41.6 - 58.6]	0.8
LVESV_I	22.1 [16.5 - 30.5]	24.6 [18.6 - 30.8]	0.5
Interventricular septum (cm)	1.2 [1.1 - 1.4]	1.2 [1.1 - 1.3]	0.89
FS (%)	33.3 (11.5)	31 (10.2)	<0.01
E/A	0.9 [0.7 - 1.2]	0.9 [0.7 - 1.2]	0.59
E/E'	11 [9 - 15]	10 [8 - 13]	0.1
WMSI	1.3 [1 - 1.7]	1.6 [1.3 - 1.8]	<0.01
Left ventricular mass (g)	220.7 (70.4)	205.8 (57.5)	<0.01
Left ventricular ejection fraction %	53.4 (11)	50.33 (10.2)	<0.01
Mitral insufficiency (%)	72.8	63.5	<0.01
Mitral insufficiency grade (%)			<0.01

- Mild	61	59	0.55
- Moderate	10.8	3.8	<0.01
- Severe	0.9	0.7	0.69
Therapy at admission (%)			<0.01
- Medical therapy	34.6	11.8	<0.01
- PCI	49.4	85.3	<0.01
- CABG	15.1	1.6	<0.01
- First PCI and then CABG	0.9	1.3	0.52
GPIIb/IIIa inhibitors (%)	4.8	18.3	<0.01
Multi-vessel disease >70% (%)	46	34.4	<0.01
Severe hemorrhagia (%)	2	0.7	0.04
Supraventricular arrhythmias (%)	11.2	5.5	<0.01
Ventricular arrhythmias (%)	6.9	15.7	<0.01
Brady arrhythmias (%)	4.9	6.7	0.25
hsCRP (mg/l)	5.7 [2 - 15.1]	4.2 [1.7 - 12.68]	0.02
A β 1-40 (pg/ml) at admission	93.6 [61.2 - 131]	85.3 [52.9 - 128.7]	0.1
Therapy at discharge (%)			
- ACE-I/ARB	72	73.8	0.53
- Beta-blockers	80	77.7	0.39
- Digital	1.4	0.4	0.06
- Amiodarone	13.3	4.5	<0.01
- Antialdosteronic agents	12.1	14.2	0.36
- Loop diuretics	15.7	25	0.81
- Aspirin	91.3	93.1	0.31
P2Y12 inhibitors			<0.01
o Clopidogrel	39	25.2	<0.01
o Prasugrel	5.5	29.2	<0.01
o Ticagrelor	29.8	36.4	0.03
- Statins	87.3	91.1	0.05
- Oral antidiabetics	14.7	12.3	0.27
- Insulin	9.8	7.1	0.12
TAO	9.2	4.8	0.01
NAO	0.9	4.3	0.15
NYHA class at discharge (%)			0.24
- NYHA 1	82	85.9	0.1
- NYHA 2	16.2	12.9	0.14
- NYHA 3	1.7	1.2	0.46

ACE-I: angiotensin-converting enzyme inhibitors; ARB: angiotensin receptor blockers; A β 1-40: Amyloid beta 1-40; BMI: body Mass Index; CABG: coronary artery bypass graft; DAPT: dual antiplatelet therapy; DBP: diastolic blood pressure; FS: fractional shortening; GFR: glomerular filtration rate; GRACE: Global Registry of Acute Coronary Events; HbA1c: glycosylated hemoglobin; HDL: high-density lipoprotein; hsCRP: high sensitivity C-reactive protein; IHD: ischemic heart disease; IL-1 β : interleukin-1 β ; LDL: low-density lipoprotein; LVEDD: left ventricular end-diastolic diameter; LVEDV: left ventricular end-diastolic volume; LVESD: left ventricular end-systolic diameter; LVESV: left ventricular end-systolic volume; MI: myocardial infarction; Na: sodium; NYHA: New York Heart Association; PCI: percutaneous coronary intervention; SBP: systolic blood pressure; WMSI: wall motion score index.

Table S2. Baseline characteristics of patients with NSTEMI and STEMI stratified by the endpoint all-cause mortality.

	NSTEMI (n=350)			STEMI (n=769)		
	Alive (n=276)	Death (n=74)	p-value	Alive (n=650)	Death (n=119)	p-value
Age (years)	65.5 (10.7)	74.81 (7.5)	<0.01	63.8 (11.2)	76.68 (9.8)	<0.01
Male sex (%)	69.9	68.9	0.87	75.8	59.7	<0.01
BMI (kg/m ²)	26.8 [24.1 - 30.1]	24.9 [22.2 - 27.8]	0.01	26.3 [24.2 - 29.4]	25.6 [23.2 - 27.8]	0.01
SBP at admission (mmHg)	140.3 (22)	135.4 (26.1)	0.11	130.4 (22.2)	130.3 (25.6)	0.96
DBP at admission (mmHg)	80 [70 - 90]	75 [70 - 80]	<0.01	80 [70 - 85]	74 [65 - 80]	0.04
Heart rate at admission (bpm)	72 [64 - 81]	75.5 [68 - 90]	0.02	75 [65 - 85]	80 [68 - 90]	0.06
Cardiac arrest (%)	2.5	8.1	0.02	4.5	3.4	0.59
Left bundle branch block (%)	4.7	17.6	<0.01	1.7	7.6	<0.01
Killip >1 (%)	11.6	39.2	<0.01	11.7	38.7	<0.01
Hypertension (%)	71.4	86.5	0.01	56.5	74.6	<0.01
Diabetes mellitus (%)	21.4	45.9	<0.01	18.5	28.6	<0.01
Smoking (%)	42.4	37.8	0.48	50.5	39.5	0.03
Dyslipidemia (%)	61.6	71.6	0.11	48.2	45.8	0.63
Positive family history for IHD (%)	24.6	23	0.77	20.8	9.3	<0.01
Known GFR<60 ml/min/1.73 m ² (%)	5.1	32.4	<0.01	4	18.6	<0.01
Peripheral artery disease (%)	3.6	21.6	<0.01	2.5	12.7	<0.01
Previous MI/PCI/CABG (%)	24.3	44.6	<0.01	10.3	19.3	0.01
Anaemia at admission (%)	18.5	60.8	<0.01	18	48	<0.01
Total cholesterol (mg/dl)	184.2 (48.8)	169.6 (53)	0.03	195.7 (46)	176.8 (44.4)	<0.01
LDL cholesterol (mg/dl)	112.5 [81.7 - 142.9]	90.6 [74.2 - 128]	0.02	122.9 [99 - 148.9]	106.9 [80.4 - 133.7]	<0.01
HDL cholesterol (mg/dl)	43 [36 - 53]	42 [33 - 51.75]	0.42	43 [36 - 51]	44 [36 - 52]	0.71
Triglycerides (mg/dl)	116 [88 - 149]	107 [77.5 - 137]	0.2	113 [83 - 153.5]	109 [82 - 145]	0.41
hs-TnI max (ng/l)	3340 [800.8 - 9215.3]	4400 [910 - 12540]	0.32	29649 [10139 - 71130]	45900 [11025 - 113500]	0.07
Hb1AC%	6 [5.6 - 6.6]	6.1 [5.9 - 6.9]	0.05	5.8 [5.5 - 6.5]	6.1 [5.7 - 6.7]	<0.01
Na ⁺ at discharge (mEq/l)	140 [138 - 141]	139 [137 - 141]	0.15	139 [138 - 141]	140 [137 - 141]	0.6
Haemoglobin at discharge (g/dl)	12.64 (2)	11.42 (1.7)	<0.01	13 (1.6)	11.5 (1.7)	<0.01

Creatinine at discharge (mg/dl)	0.9 [0.8 - 1.1]	1.2 [0.9 - 1.8]	<0.01	0.9 [0.8 - 1.1]	1.1 [0.8 - 1.4]	<0.01
GFR at discharge (ml/min)	80 [65.9 - 95.1]	54.3 (25.4)	<0.01	84.2 [69.1 - 100.9]	66.4 [43.7 - 88.4]	<0.01
GFR<60 ml/min/1.73 m ² at discharge	5.1	32.4	<0.01	4	18.6	<0.01
GRACE score at 6 months	115.6 (28.3)	142 (30.8)	<0.01	133.3 (31.8)	157.7 (35.2)	<0.01
LVEDD_I	2.5 [2.3 - 2.7]	2.8 [2.4 - 3.1]	<0.01	2.5 [2.3 - 2.7]	2.6 [2.4 - 2.8]	0.01
LVESD_I	1.6 [1.4 - 1.9]	1.8 [1.5 - 2.3]	0.01	1.7 [1.5 - 1.9]	1.8 [1.6 - 2.1]	<0.01
LVEDD_I	49.8 [40.7 - 61]	56.6 [43.5 - 70.5]	0.01	49.8 [41.3 - 58.7]	50.2 [43 - 57.9]	0.63
LVESD_I	21 [16.3 - 27.5]	26.2 [18.1 - 47.9]	<0.01	24.1 [18.3 - 30.4]	26.6 [21.1 - 33.7]	0.01
Interventricular septum (cm)	1.2 [1.1 - 1.4]	1.2 [1.1 - 1.5]	0.6	1.2 [1.1 - 1.3]	1.2 [1.1 - 1.4]	0.06
FS%	33.4 (11.1)	32.6 (12.9)	0.62	31.5 (10)	28.4 (10.5)	<0.01
E/A	0.9 [0.7 - 1.2]	0.9 [0.7 - 1.4]	0.74	0.9 [0.7 - 1.2]	0.8 [0.7 - 1.4]	0.51
E/E'	10 [8 - 13]	15.9 [12.5 - 20]	<0.01	10 [8 - 12]	12 [10 - 15]	<0.01
WMSI	1.25 [1 - 1.5]	1.5 [1.3 - 2]	<0.01	1.5 [1.3 - 1.8]	1.7 [1.3 - 2]	<0.01
Left ventricular mass (g)	212.8 (66.7)	251.6 (76.5)	<0.01	205.3 (57.9)	209.3 (55.2)	0.59
LVEF%	54.8 (10.2)	47.9 (12.1)	<0.01	51 (10)	46.5 (10.4)	<0.01
Mitral insufficiency (%)	70.2	82.4	0.05	62.4	69.8	0.15
Mitral insufficiency grade (%)			<0.01			
- Mild	62.7	54.4	0.21	59.1	58.5	0.9
- Moderate	7.1	25	<0.01	2.8	9.4	<0.01
- Severe	0.4	2.9	0.05	0.5	1.9	0.11
Therapy at admission (%)			0.74			
- Medical therapy	33.3	39.2	0.35	37.6	30.2	<0.01
- PCI	50.4	45.9	0.5	59.1	58.5	<0.01
- CABG	15.6	13.5	0.66	2.8	9.4	0.91
- First PCI and then CABG	0.7	1.4	0.6	0.5	1.9	0.63
GPIIb/IIIa inhibitors (%)	4.6	5.4	1	19.2	13	0.16
Multi-vessel disease >70% (%)	39.3	71.8	<0.01	33.3	41.1	0.11
Severe hemorrhagia (%)	1.1	5.4	0.04	0.5	1.7	0.17
Ventricular arrhythmias (%)	5.5	12.3	0.04	15.8	14.7	0.75
Supraventricular arrhythmias (%)	7.3	25.7	<0.01	3.8	14.7	<0.01

Brady arrhythmias (%)	4.7	5.4	0.81	5.7	12.1	0.01
hsCRP (mg/l)	4.7 [1.7 - 12.4]	10.7 [4.9 - 35.6]	<0.01	3.7 [1.5 - 9.7]	11.2 [3.4 - 28.4]	<0.01
Aβ1-40 (pg/ml) at admission	86.6 [57.2 - 125.2]	113.9 [74 - 156.3]	<0.01	82.7 [51.4 - 121.9]	118.9 (68.6)	<0.01
Therapy at discharge (%)						
- ACE-I/ARB	73.1	67.6	0.36	75.5	63.7	<0.01
- Beta blockers	82.2	71.4	0.05	79.4	68.1	0.01
- Digital	0.7	4.2	0.61	0.2	10.6	0.01
- Amiodarone	11.3	21.4	0.03	3.4	10.6	<0.01
- Antialdosteronic agents	10.5	18.3	0.07	13.1	20.4	0.04
- Loop diuretics	18.9	52.1	<0.01	20.9	48.7	<0.01
- Aspirin	91.6	90.1	0.69	95.1	81.4	<0.01
- P2Y12 inhibitors			<0.01			<0.01
o Clopidogrel	34.5	56.3	<0.01	21.1	48.7	<0.01
o Prasugrel	6.2	2.8	0.27	32.6	14.2	<0.01
o Ticagrelor	34.2	12.7	<0.01	39.8	16.8	<0.01
- Statins	89.1	80.3	0.05	93.7	76.1	<0.01
- Oral antidiabetics	14.2	16.9	0.56	11.7	15.9	0.21
- Insulin	4.7	29.6	<0.01	6.5	10.6	0.11
- TAO	6.9	18.3	<0.01	4.2	8.8	0.03
- NAO	1.1	4.9	0.61	4.9	2.6	0.55
NYHA class at discharge (%)						
- NYHA 1	89.8	51.4	<0.01	89.5	65.2	<0.01
- NYHA 2	9.8	41.4	<0.01	9.9	30.4	<0.01
- NYHA 3	0.4	7.1	<0.01	0.6	4.5	<0.01

ACE-I: angiotensin-converting enzyme inhibitors; ARB: angiotensin receptor blockers; Aβ1-40: Amyloid beta 1-40; BMI: body Mass Index; CABG: coronary artery bypass graft; DAPT: dual antiplatelet therapy; DBP: diastolic blood pressure; FS: fractional shortening; GFR: glomerular filtration rate; GRACE: Global Registry of Acute Coronary Events; HbA1c: glycosylated hemoglobin; HDL: high-density lipoprotein; hsCRP: high sensitivity C-reactive protein; IHD: ischemic heart disease; IL-1β: interleukin-1β; LDL: low-density lipoprotein; LVEDD: left ventricular end-diastolic diameter; LVEDV: left ventricular end-diastolic volume; LVESD: left ventricular end-systolic diameter; LVESV: left ventricular end-systolic volume; MI: myocardial infarction; Na: sodium; NYHA: New York Heart Association; PCI: percutaneous coronary intervention; SBP: systolic blood pressure; TNF-α: tumor necrosis factor-alpha; WMSI: wall motion score index.