

# Emergency Psychiatric Service & Determining Factors for Decision Making During Risk Taxation of Suicidal Behavior

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WORLD CONGRESS

[WWW.SUICIDALITEIT.NL](http://WWW.SUICIDALITEIT.NL)



**Parnassia Groep**



**UNIVERSITY  
AMSTERDAM**

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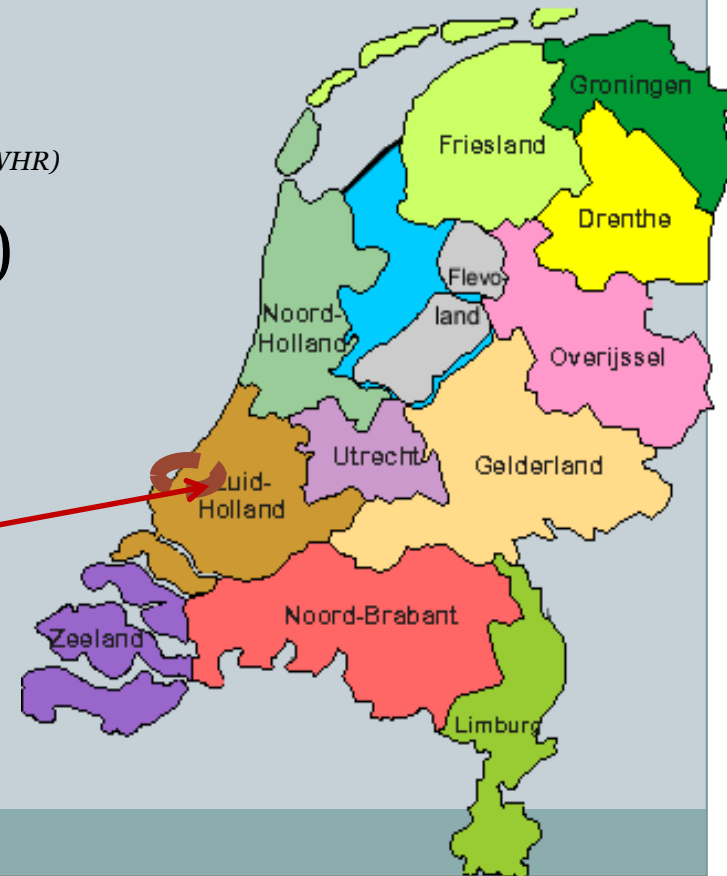


- Description the Netherlands and The Hague
- Suicidal behaviour in the Netherlands
- Emergency psychiatry The Hague
- Database the Hague
- Questions
  
- Characteristics suicidal behaviour mental health in The Hague
  - Gender/age
  - Primary diagnosis/ method of attempt
  - Admission
  - Determining factors
- Limitations
- Conclusions

# Netherlands



- 16.78 million inhabitants
- Within top 15 richest countries (↓)
- Top 30 safest places
- 7<sup>th</sup> place happiness population (↓) (WHR)
- High density psychiatrists (1:5600)
- Suicide rate 1:11.03 overall (2013)
  - Since 5 years >30% increase



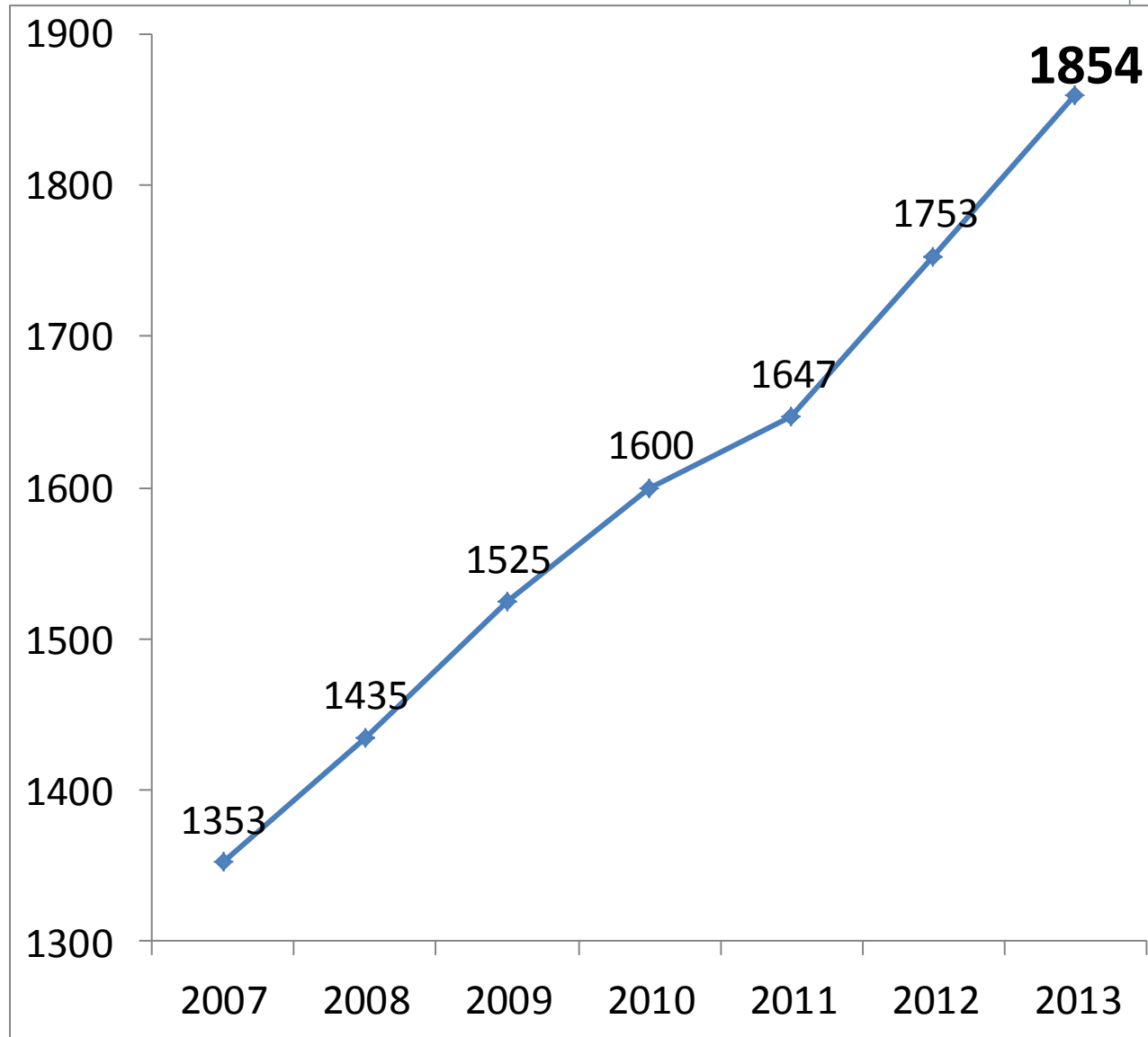
## Suicide rate in the Netherlands

between 2007-2013  
(male: female = 2.2:1)

2013 : 16 779 575  
citizens

2007 : peak economy,  
lowest suicide rate since  
1970

<http://bit.ly/1JQN4W7>



# Facts & figures ...2012

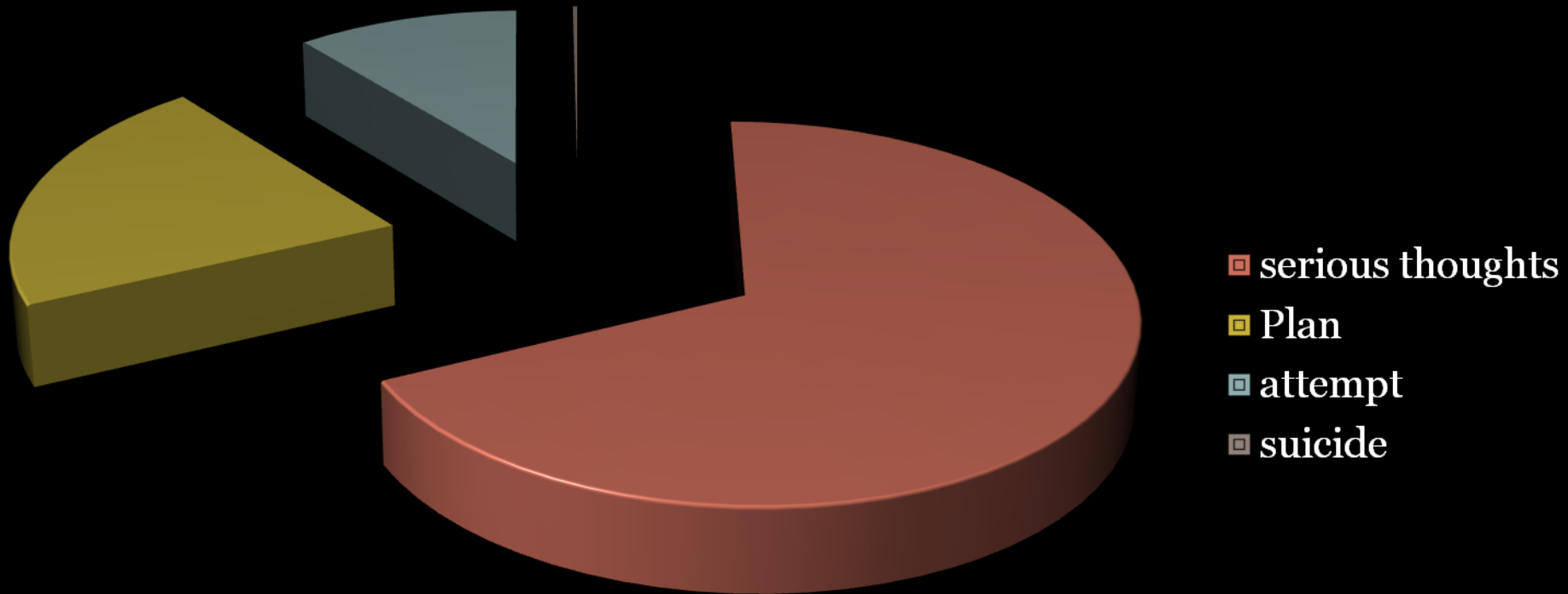
## Not natural causes deaths

	Total	percentage
Total	6333	100%
Falling	2795	41.4%
<b>Suicide</b>	<b>1753</b>	<b>27.7%</b>
traffic	684	10.9%
Suffocation	119	2,0%
Murder	143	2,4%
Drowning	70	1.2%
poisoning	128	2.1%
Work related	59	1,0%
Burning	27	0,5%
By an object	21	0,5%
Private situation	208	3,6%
Unknown	534	8.4%

## Methods of suicide (2012)

Methods of suicide	Number all	%
Total	1753	100%
Hanging	709	40.4%
Medication/alcohol	319	18.2%
Jumping in front of a train/subway	188	10.7%
Jumping from height	135	7.7%
Drowning	125	7.1%
Firearm	97	5.5%
Bag (helium?)	98	5.6%
Rest	82	4.7%

# Prevalence suicidal behaviour



# Suicidal behaviour in society



- Suicide..... too late for mental health
- 40% suicides treatment in mental health....
- **Mental health**
- Experts diagnosis & treatment of serious suicidal behaviour?

# Importance emergency psychiatry



- Outreaching 24 hours service
  - Recognised suicidal behaviour > mental health
  - Selection of serious suicidal behaviour?
- 
- While et al. 2012
    - ✦ Provision 24h hours service: biggest fall in suicide rates



# The Hague Emergency Psychiatry



- Around 5.500 consultations each year
- 4 teams a day: couple MD and nurse





# The Hague



- Third city in the netherlands
- International Criminal Court
- Catchment area 700.000 citizins
- Seat of government, not capital city!
- No University!
- **One mental health institute**



# The Hague



- Four of 10 poorest city areas of the country
- 49% immigrants
- One mental health institute



# Questions



- **Unique situation:**
  - High estimated risk by any counselor
    - ✦ Consultation by emergency psychiatry!
    - ✦ One catchment area
- Characteristics of suicidal patients?
- Gender characteristics?
- Symptoms and suicidal behaviour?
- Predictors for admission (voluntary/unvoluntary)?



# Methods



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- Emergency psychiatry The Hague
- Between 2009 (july)-2014 (september): 21431 consultations
- **14705 face tot face consultations**
- **Registration MD and nurse**
- Every (work)day registration database by administrator
- Detailed information in database
  - General characteristics
  - Suicidal behaviour = clinical judgement MD and nurse
  - Diagnosis (primary for Health insurance)
  - Decision of treatment and follow-up
  - Ethnicity
  - etc

# Analysis



- SPSS 20.0
- Descriptive
- Chi-square
- Multiple regression analysis
- Bootstrap regression analysis

# Suicidal behaviour

The Hague Emergency Psychiatry



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- Between 2009-2014: **14.705 face tot face consultations**
- Consultation: 4515 suicidal patients (30.7%)
- Attempts **1549** patients (34.3% suicidal patients, 10.5 % all)
- Method described for 1367 patients (88.3%)

<b>Primary diagnosis (n = 14705)</b>	<b>All</b>	<b>Suicidal</b>	<b>Suicidal -</b>
<b>Depressive disorder ***</b>	13.9%	<b>28.5%</b>	6.6%
<b>Other affective disorder *</b>	7.4%	5.4%	8.4%
<b>Adjustment disorder***</b>	2.1%	3.6%	1.4%
<b>neurotic /anxiety disorder</b>	7.2%	9.4%	6.2%
<b>Personality disorder ***</b>	6.7%	11.0%	4.7%
<b>Psychotic disorder***</b>	<b>25.6%</b>	10.4%	32.8%
<b>Organic disorder***</b>	4.3%	0.95%	5.9%
<b>Referred diagnosis</b>	6.8%	4.7%	7.7%
<b>alcohol/substance</b>	19.7%	19.7%	19.7%
(primary alcohol)	14.6%	16.0%	14.0%
(primary substance)	5.1%	3.8%	5.7%
<b>Rest</b>	6.3%	6.4%	6.3%



# Diagnosis during emergency consultation clarification



## Depressive disorder

- 66.2% also suicidal
- 21.2% after attempt

## Primary psychotic

- 13.1% also suicidal
- 3.2% after attempt



# Attempts and methods



Face it pal - life simply ain't worth living and you know it. This guide will help you to end the misery permanently. Ha - as if someone is going to miss you anyway, you worthless imbecil!

## Suicide FOR DUMMIES®

A Reference  
for no one  
except you

Written by:  
Oh, it's not important...

...well, you see, my wife ran off with our lawyer. Took the kids and all. I lost the car, and the house. Now I'm broke, homeless and unemployed. What am I going to do????!!!!



# The Hague Emergency Psychiatry

n= 1549



## Methods (rounded percentages)

<b>Medication</b>	774	50%
<b>Cutting</b>	162	12%
<b>Several (gun, car, forced accident etc)</b>	132	9%
<b>Hanging</b>	118	8%
<b>Rail vehicle</b>	54	4%
<b>jumping</b>	47	3%
<b>Poison</b>	42	4%
<b>Drowning</b>	20	2%
<b>unknown/write error</b>	182	12%

# Gender and suicidal behaviour



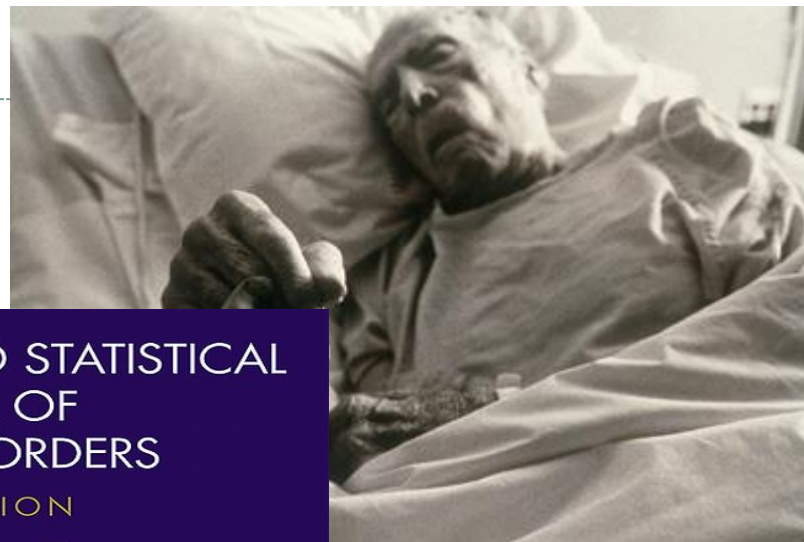
	<b>Suicidal behaviour</b>	<b>p</b>	<b>Suicidal attempts</b>	<b>P</b>
male	23.0%		6.7%	
female	27.6%	<.0001	9.8%	<.0001

# Age and suicidal behaviour



	Suicidal behaviour	p	Suicidal attempts	P
yes	41.7 years		39.5 years	
no	44.7 years	<.0001	44.4 years	<.0001

# Symptoms and suicidal behaviour



DIAGNOSTIC AND STATISTICAL  
MANUAL OF  
MENTAL DISORDERS

FIFTH EDITION

DSM-5



<u>Primary Diagnosis</u>	<i>Suicidal</i>	<i>p</i>	<i>Suicide attempt</i>	<i>p</i>
<b>Mood disorder</b>	↑	<.001	↑	<.001
<b>Axis II</b>	↑	<.001	↑	<.001
<b>Anxious disorder</b>	↑	<.001	=	ns
<b>Adjustment disorder</b>	=	ns	↑	<.001
<b>Deferred</b>	↓	<.001	=	ns
<b>Drugs/alcohol</b>	=	ns	↓	<.001
<b>Organic</b>	↓	<.001	↓	<.001
<b>Psychotic disord.</b>	↓	<.001	↓	<.001



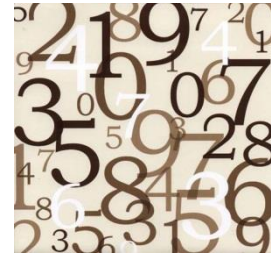
# Admission voluntary or not....



**TIME  
TO  
WAKE  
UP!**



All patients Emergency psychiatry 2009–2014  
*Voluntary admission–compulsary/coercive*



	<b>Admission</b>	<b>Vol/Comp-coerc</b>
<b>No suicidal behaviour</b>	<b>24.1%</b>	<b>11.9/12.3%</b>
<b>Suicidal thoughts</b>	<b>37.3%</b>	<b>25.4/11.9%</b>
<b>Suicide attempt</b>	<b>43.7%</b>	<b>24.7/19.0%</b>

# Voluntary admission and suicidal behaviour



Voluntary admission	significance	Exp(B)	CI
Age	0.04	0.91	0.82 – 0.99
Gender (female)	0.001	0.78	0.67 – 0.90
<b>Drugs/alcohol</b>	<0.0001	2.23	1.78 – 2.78
<b>Mood disorder</b>	<0.0001	2.01	1.64 – 2.48
<b>Psychotic symptoms</b>	<0.0001	1.80	1.37 – 2.36
<b>Axis II</b>	<0.0001	1.63	1.26 – 2.10
<b>Hanging</b>	0.011	1.88	1.15 – 3.08

# Involuntary Admission and suicidal behaviour



Involuntary admission	significance	Exp(B)	CI
Gender (male)	0.019	0.79	0.64 – 0.96
<b>Mood disorder</b>	<0.0001	1.97	1.56 – 2.47
<b>Organic</b>	<0.0001	9.36	4.95 – 19.09
<b>Psychotic symptoms</b>	<0.0001	7.71	5.93 – 10.02
Jumping	0.001	3.68	1.70 – 7.99
Rails	0.001	3.16	1.58 – 6.34
<b>Hanging</b>	<0.0001	6.87	4.11 – 11.47
<b>Cutting</b>	<0.0001	3.05	1.88 – 4.95

# Conclusions



- Suicidal behaviour “common” in emergency psychiatry
- For all patients > suicidal behaviour:
  - ↓ **Deferred, Drugs/alcohol, Organic, Psychotic disord.**
  - ↑ **Mood disorder, Axis II, Anxious disorder, Adjustment disorder**

# Conclusions 2

## suicidal: predictors



- **Voluntary**

- Male

- Older

- Drugs/alcohol

- Axis II

- Affective disorder

- Psychotic

- **Involuntary**

- Female



- Attempt (severity)

- Organic

- Affective disorder

- Psychotic

# Limitations & strengths

- 
- 
- Not detailed, no questionnaires, underestimation
  - Absence of differentiation unique/consultation
  - Overlap patients in consultation and correction bootstrap...
  - Comparison voluntary/unvoluntary



- Size
- Control of Area
- Concordance in consultation
- “all” serious suicidal behaviour > consultation



# Thank you audience!!!!!!!



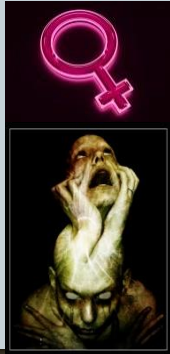
- And also
- Marina Dassen MD
- Mathijs Deen M.Sc
- Jolien Bueno de Mesquita MD, Ph.D
- Bert van Hemert MD, Ph.D



# Conclusions 2



- voluntary



- involuntary

