

YOUTH SUICIDE PREVENTION

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WHY SUICIDALITY IN TEENS IS SO IMPORTANT!

- **A leading cause of death**
- **Suicide attempts are the most common reason for seeking psychiatric care in the mid teens**
- **Although attempts rarely predict a later suicide at this age they are nearly always associated with an impairing disorder**

LEADING CAUSES OF DEATH IN 15- TO 19-YEAR-OLDS

— UNITED STATES, 2000 —

CAUSE	# OF DEATHS	
Accidents	6573	
Homicide	1861	
Suicide	1574	
Cancer/Leukemia	759	} 1631
Heart Disease	372	
Congenital Anomalies	213	
Lung Disease	151	
Stroke	60	
Diabetes	40	
Blood Poisoning	36	
HIV	36	

Suicide Spectrum

- Suicidal ideation
- Suicidal threats
- Suicidal gestures
- Deliberate self harm
- Suicide attempts
- Serious suicide attempt
- Interrupted attempt

Non-Suicidal Self-Harm

- Self-cutting, repetitive and stereotypical
- To relieve distress/anger, pain, loneliness rather than to die
- Often co-occurs with suicidal behavior

Suicide rates in the age group 15-19 years in WHO European region



High suicide rate
11 (Croatia) to 24 (Kazakstan)

Lower-middle suicide rate
4 (United Kingdom) to 7.6 (Bulgaria)

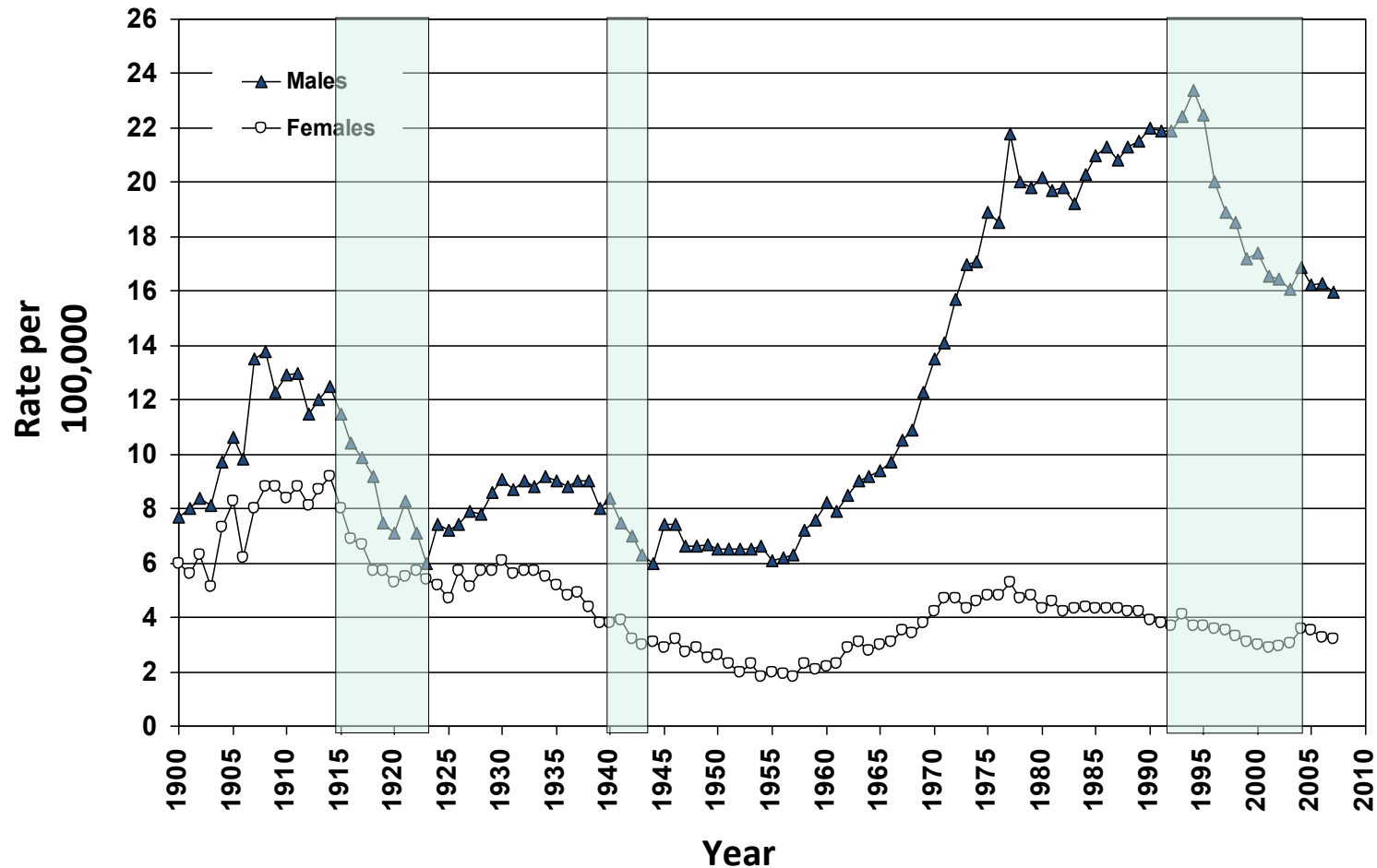
Upper-middle suicide rate
8.1(Czech Republic) to 10.8 (Switzerland)

Low suicide rate
0.01 (Malta) to 3.8 (Spain)

Data not available
for 15-19 years

20TH - AND 21ST -CENTURY CHANGES IN YOUTH SUICIDE RATES BY GENDER

— UNITED STATES, AGES 15–24, 1900–2007 —



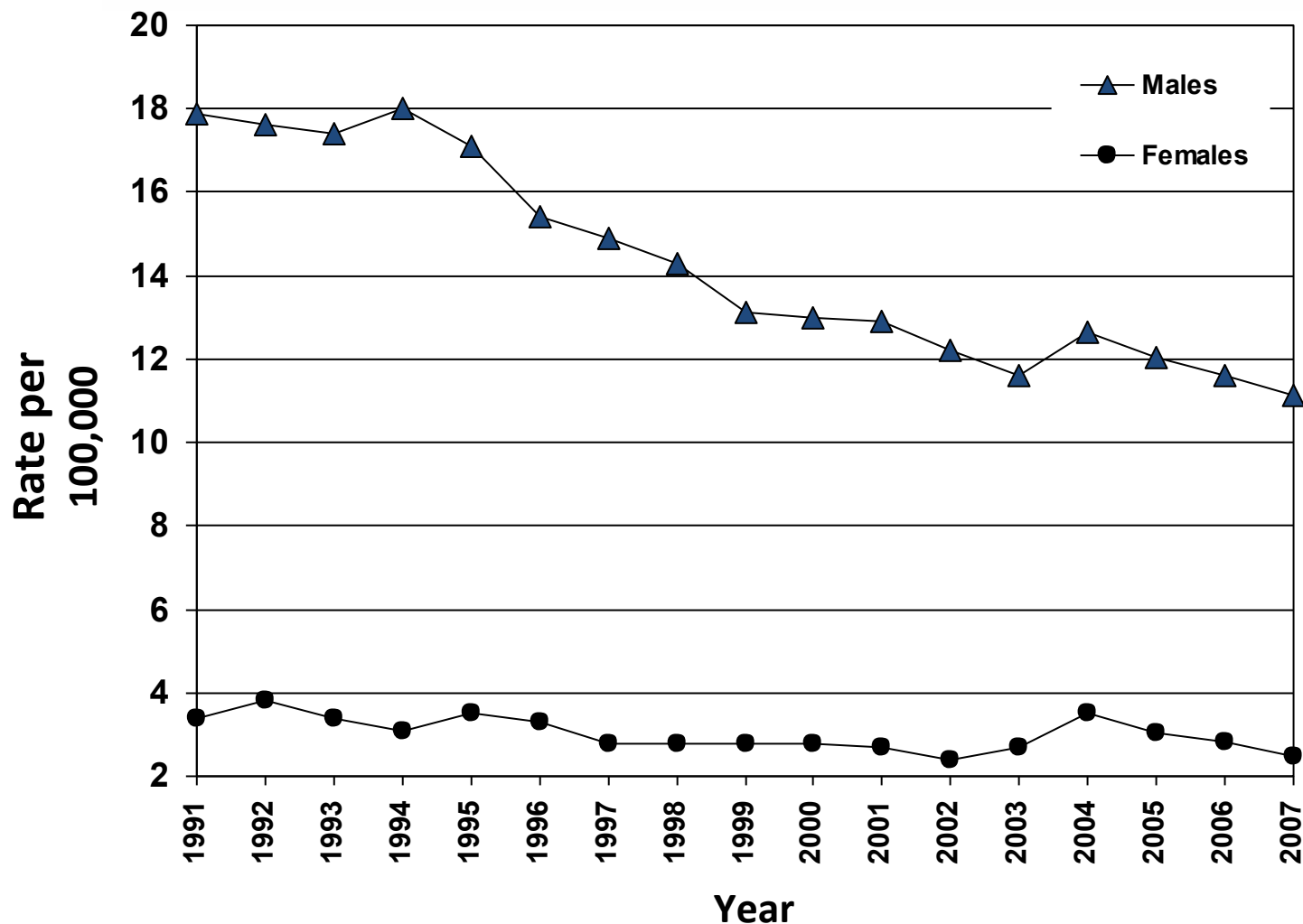
Anderson 2002, CDC, NCIPC 2005 (WISQARS) (cited 06/02/2010),
CDC Wonder 2003, USDHEW 1956, Vital Statistics U.S. 1954–1978

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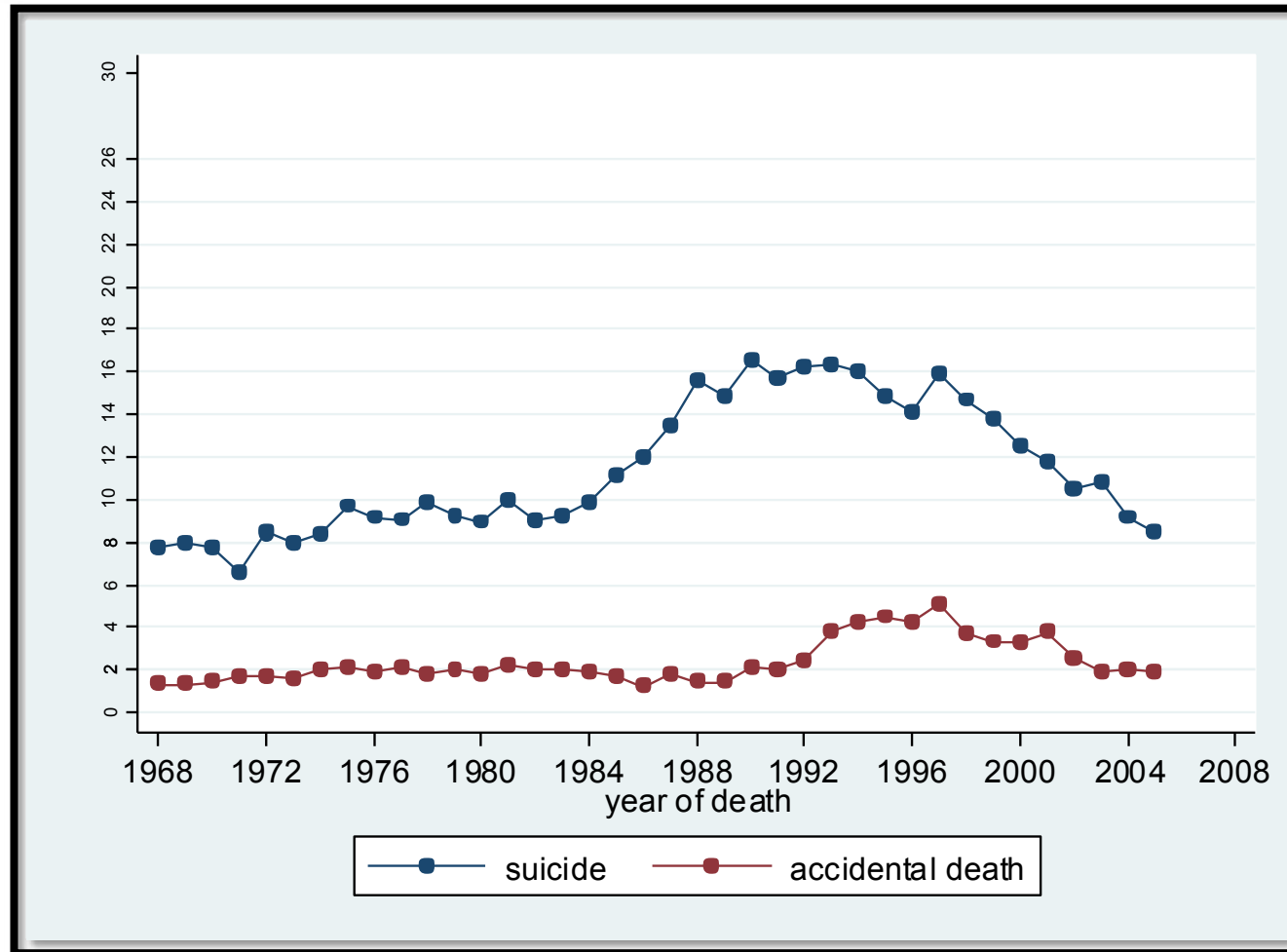


TEEN SUICIDE RATES BY GENDER

— UNITED STATES, AGES 15–19, 1991–2007 —



TRENDS IN SUICIDE RATES IN 15-24 YEAR OLDS MALES IN ENGLAND AND WALES 1968-2005



Biddle, Brock, Brooks and Gunnell. Unpublished

THREE SETS OF PERSONALITY CONSTELLATIONS

- **Narcissism , perfectionism and the inability to tolerate failure**
- Hopelessness often related to underlying depression
- Impulsive and aggressive characteristics combined with over sensitivity

FEATURES OF PSYCHOLOGICAL POST MORTEM SOLDIERS

- Strong narcissistic and perfectionist patterns
- Schizoid traits in personality
- The will to prove their worth
- High self – expectations and hopes
- Termed as being private/isolated people

CASE 1

Jonathan was a 20 when he killed himself.

His family had high moral standards.

They stressed controlling one's emotions and living to high standards.

He was a natural leader and popular with his teachers and peers.

In the army he excelled and was selected as an instructor for new recruits.

CASE 1

His superior commended him for his ability to perform under stress.

He became totally involved in his new duties.

His platoon of trainees did rather well, although their overall performance rating was only average.

Following the course ceremony Jonathan went to his room and shot himself.

The Impossible Situation

SEVERE MENTAL PAIN

+

COMMUNICATION DIFFICULTY

=

HIGH RISK FOR SUICIDE

Comparison Between Suicide Attempters And Non-attempters

Main Predictor:

Mental Pain

Specific Predictors:

BDI, BHS

Differentiates between attempters and non-attempters

Comparison Of Near-fatal And Low Fatality Suicide Attempters

Main Predictor: **Communication Element**

- Specific predictors:
Self disclosure, Schizoid traits and Loneliness contribute 30% to the explained variance in lethality
- Mental Pain Element (mental pain, BDI, BHS) *did not* contribute to the variance of lethality.

Suicide Intent and Lethality

From the Suicide Intent Scale (SIS; Beck):

Objective

Main Predictor – Self disclosure

Subjective

Main Predictor – Depression

More results:

- *Strong relation* between Lethality and Objective SIS
- *Weak relation* between Lethality and Subjective SIS

Mental Pain
e.g. Depression, Hopelessness



Suicidal Behavior



Communication Difficulties
e.g. Self Disclosure, Schizoid P., Loneliness, Avoidance Attach.



“The Impossible Situation”



Medically Serious Suicidal Behavior

THREE SETS OF PERSONALITY CONSTELLATIONS

- Narcissism , perfectionism and the inability to tolerate failure
- **Hopelessness often related to underlying depression**
- Impulsive and aggressive characteristics combined with over sensitivity

DEMORALIZATION – HOPLESSNESS CONSTELLATION

CASE 2

“The Case Of Ellen West”

- Daughter of wealthy Jewish parents who had great control over her
- Her father interfered twice when she became engaged
- When she finally married it was to a cousin
- From age 19 she developed the fear of becoming fat and by 21 had developed Anorexia Nervosa.
- She was hospitalized but this only increased her suicidal thoughts.

CASE 2

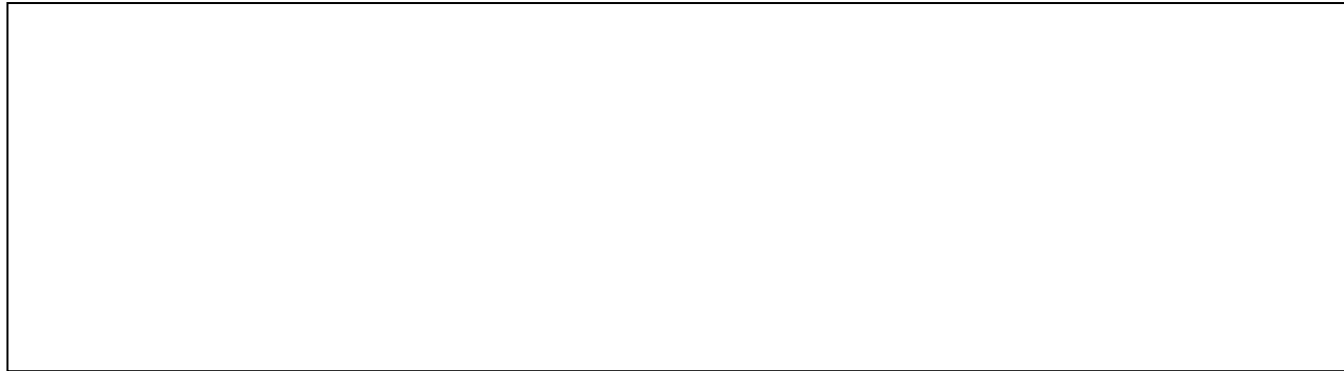
“The Case Of Ellen West”

- She was discharged from the sanatorium at the request of her family
- On the third day after returning home she appeared to be a changed person
- She ate and enjoyed a walk with her husband
- That evening she took a lethal dose of poison

THREE SETS OF PERSONALITY CONSTELLATIONS

- Narcissism , perfectionism and the inability to tolerate failure
- Hopelessness often related to underlying depression
- **Impulsive and aggressive characteristics combined with over sensitivity**

THE IMPULSIVE AGGRESSIVE CONSTELLATION



CASE 3

- Deborah had always been impulsive and oppositional from an early age.
- At about the age of 11 she developed anorexia nervosa probably as a result of her being an accomplished dancer in a ballet troop.
- With the onset of adolescence she developed very severe bulimia.

CASE 3

- Her first admission to a psychiatric unit was occasioned by a suicide note, which she wrote to her teacher at school.
- In the unit she was “an impossible patient”. By the time she was 22 she had made over 100 suicide attempts.
- She received all kinds of psychosocial and biological therapies but to no avail, although with age (now 25) there is some tempering of her emotional instability.

PERSONALITY CONSTELLATION

- There are certain individuals who, when faced with relatively minor life stressors will react with anger and anxiety and then develop a secondary depression which is often accompanied by suicidal behavior
- “serotonin-related anxiety/aggression stressor precipitated depression”

Van Praag and Apter.1997

IMPULSIVE AGGRESSION

- Most commonly seen in ER and inpatient unit
- Related to serotonergic and HPA axis dysfunction
(Van Praag)
- Strong genetic influences (Mann; Wasserman)
- Part of a high risk spectrum of behaviors (Freud;
Jessor; Klein; Menninger)

SPECTRUM OF HEALTH RISK BEHAVIORS

- Unprotected sex
- Alcohol, drug, tobacco use
- Weapon-carrying
- Binge eating and obesity
- Bullying/being bullied

IMPULSIVE AGGRESSION

- **Borderline Personality Disorder**
(Kernberg, Linehan)
- **Child and Adolescent Bipolar Disorder** (Biederman)
- **Severe Mood Dysregulation** (Leibenluft)



MANY ATTEMPTS, FEW SUICIDES

— UNITED STATES, AGES 15–19, 2007 —

Rates/100,000

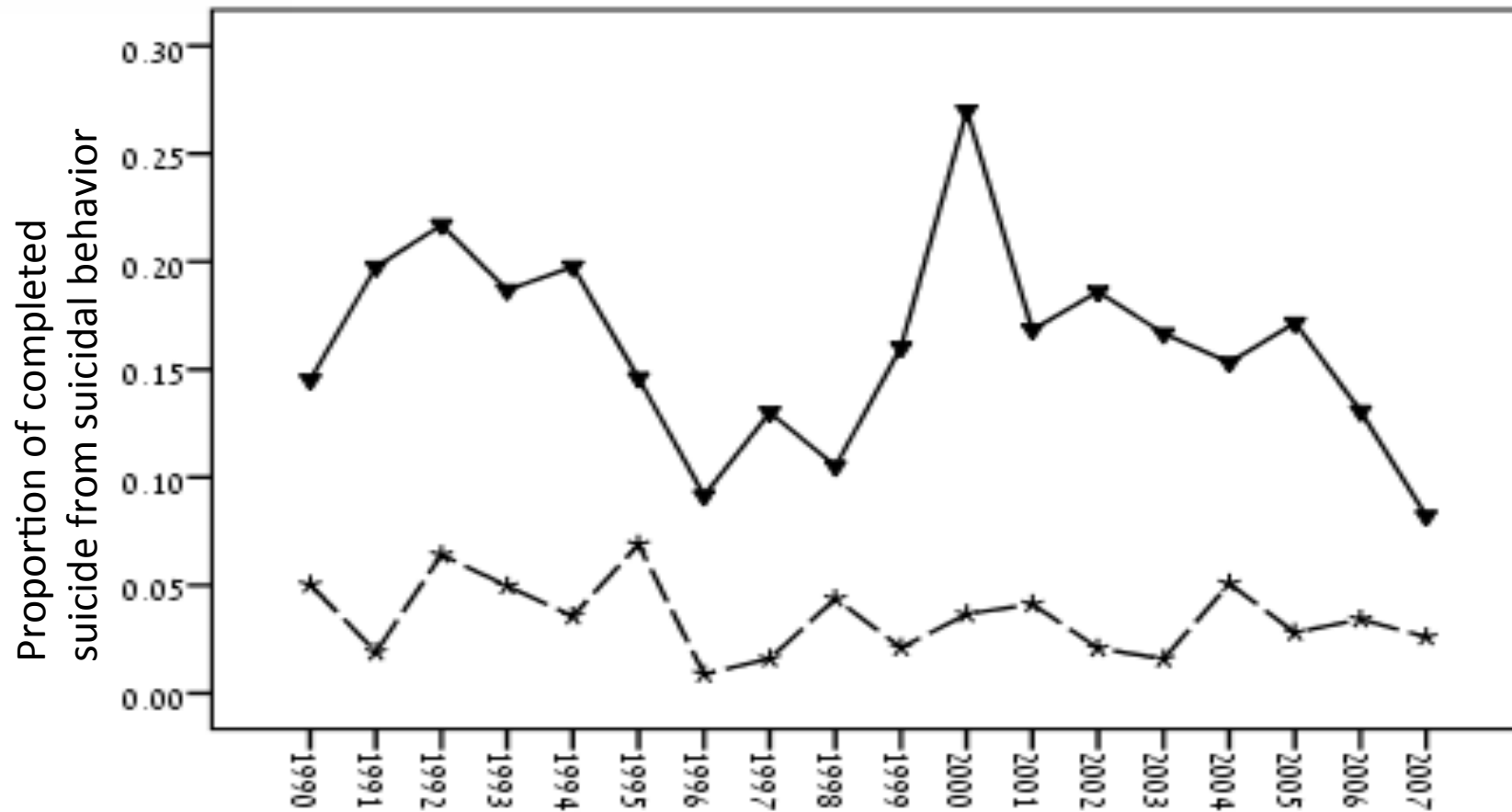
	DEATHS*	ATTEMPTS**	RATIO
Males	11.11	4,600	1:414
Females	2.49	9,300	1:3,735

*CDC, NCIPC 2005 (WISQARS) (cited 07/08/2010); **CDC MMWR (YRBS) 2008



מרכז הרפואי לילדים שניידר
Pediatric Schneider Children's Medical Center of Israel

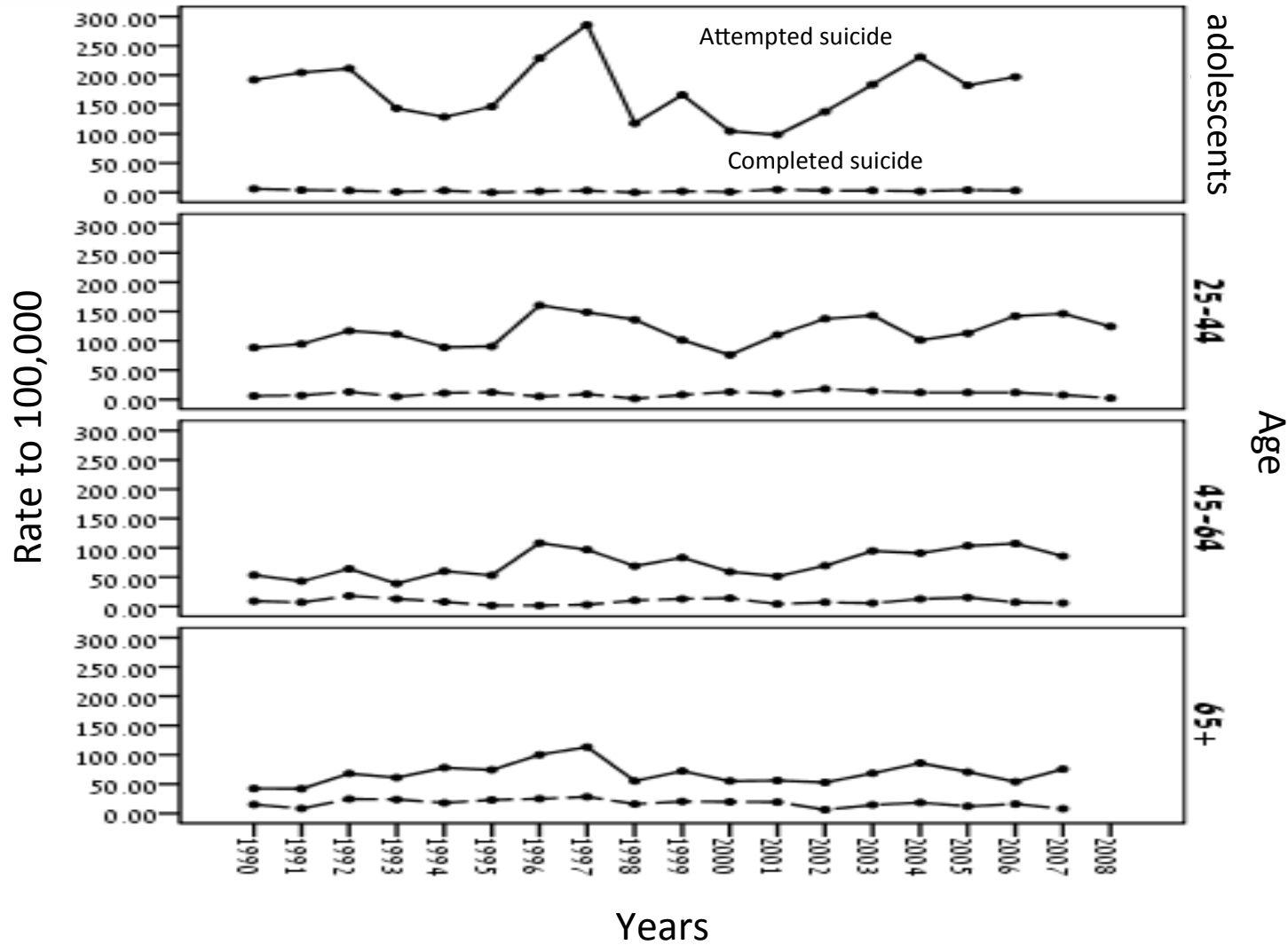
COMPLETED VS. ATTEMPTED SUICIDE HOLON-BAT YAM (WHO-EURO)





מכון לבריאות הנפש
מרכז מאגדור לילדים ונוער
Institute of Psychiatry, Child and Adolescent Psychiatry

COMPLETED VS. ATTEMPTED SUICIDE HOLON-BAT YAM (WHO-EURO)



SECONDARY PREVENTION RATIONALE FOR CASE-FINDING

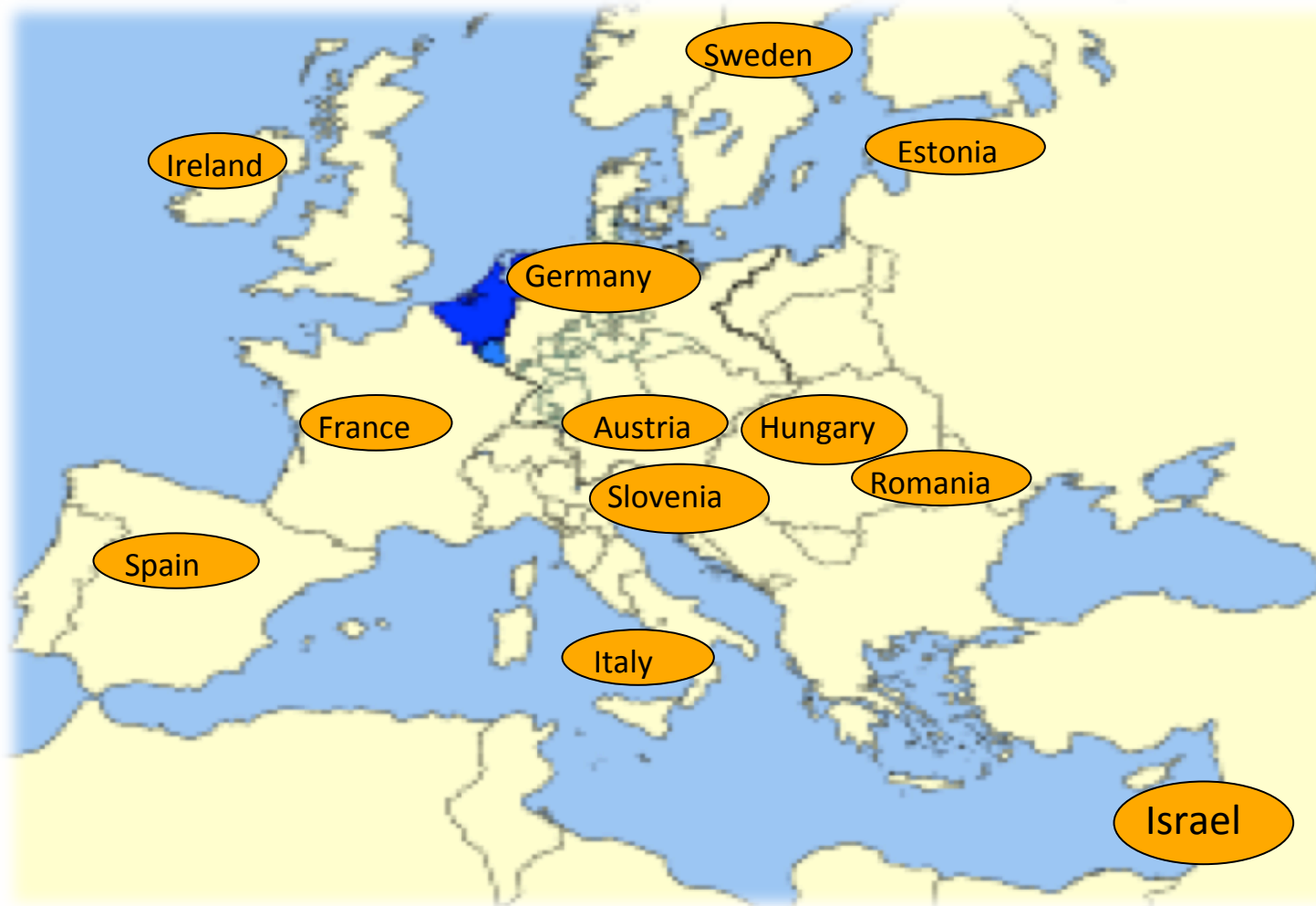
The most common predictors of suicide are a mood or anxiety disorder and a previous attempt. These are often *kept secret and go untreated (Shaffer, 2010)*.

WHAT IS THE BEST CASE-FINDING OPTION?





The SEYLE Project Participating Countries





WHY START IN SCHOOLS?

- Highest likelihood of exposure to a prevention program for adolescents
- Effects larger community connected to the school
- Teachers are inadequately trained on issues regarding adolescent suicide



Study Design

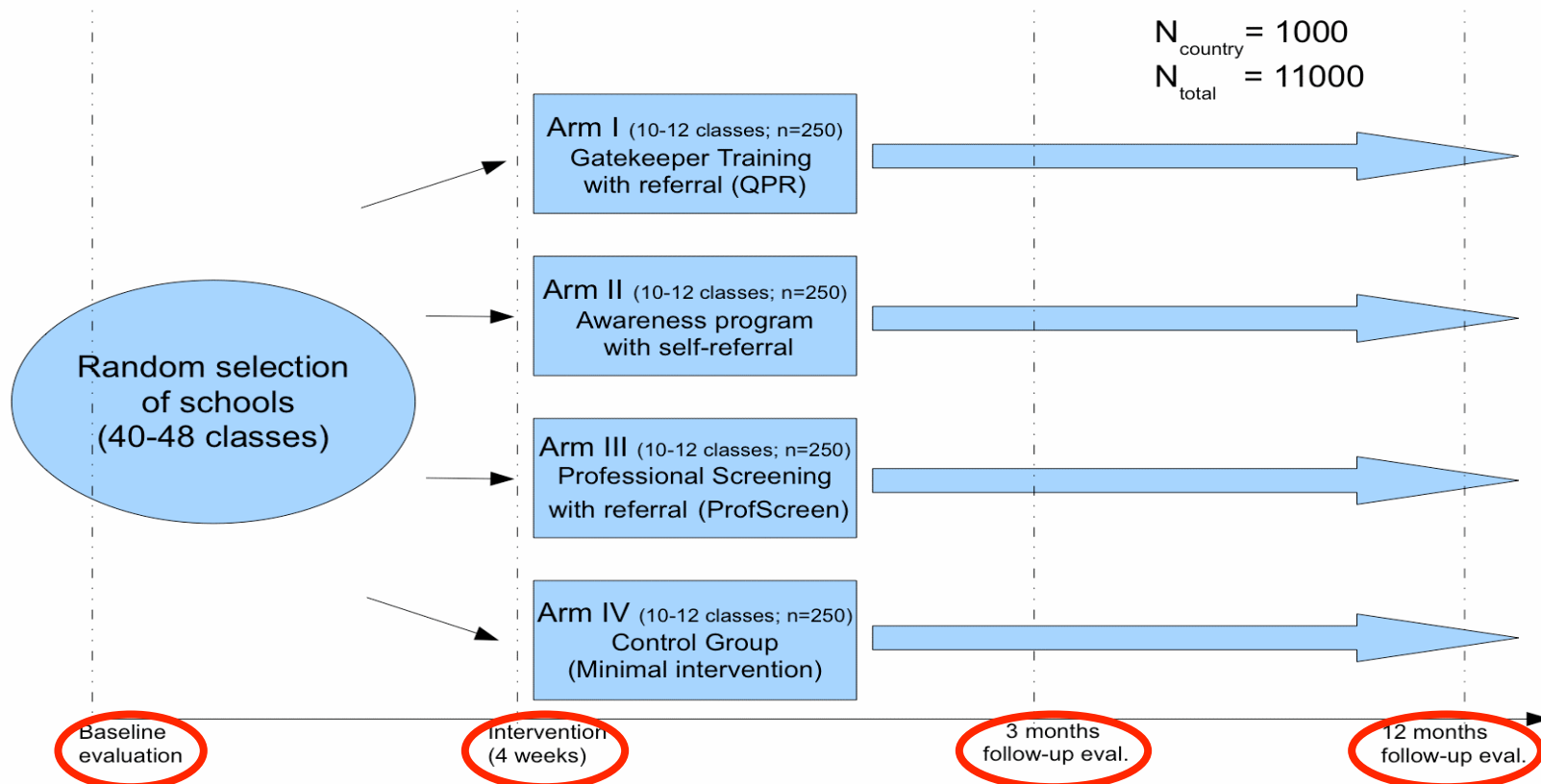
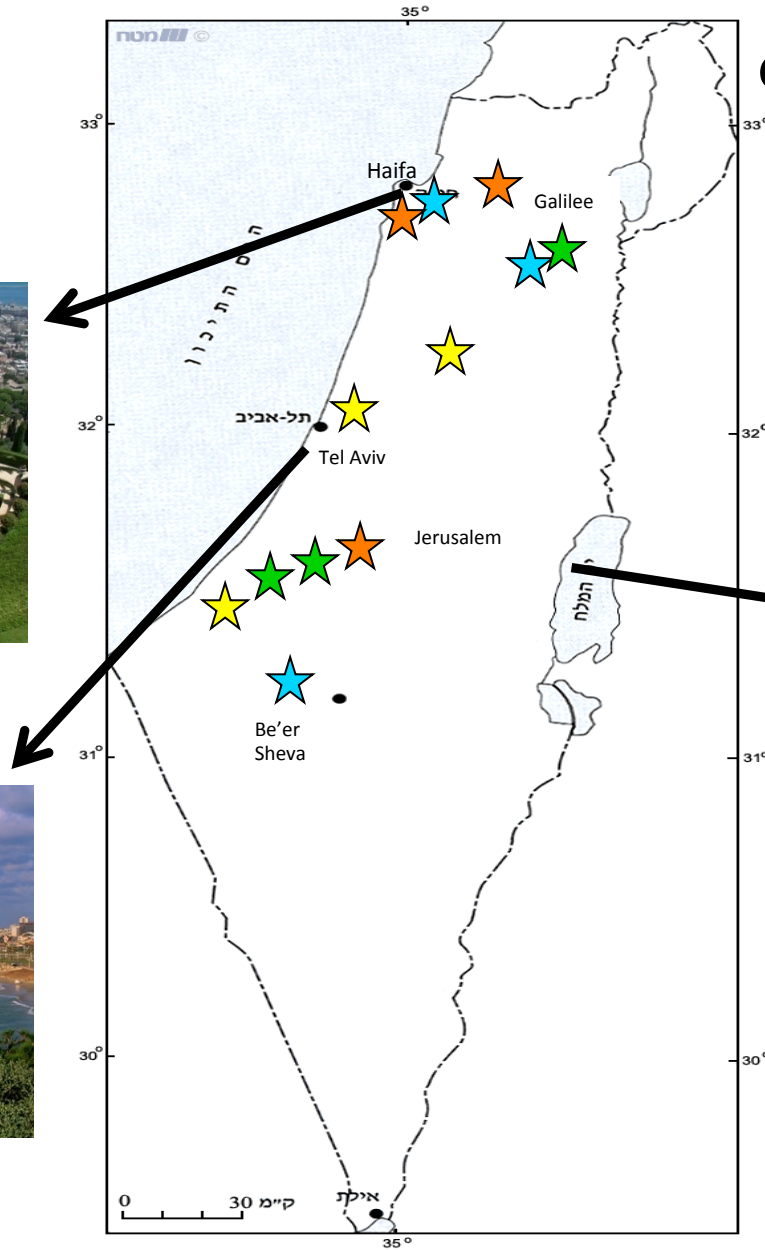


Table 3. This table represents the general study design. In every country 1000 subjects will be recruited and will undergo baseline and two follow-up evaluations. Subjects will be randomised into four arms (250 subjects in each arm). Subjects in the first three arms will undergo different kinds of interventions evaluated in the research project. Subjects in the fourth arm will undergo a minimal intervention and will be considered as control group. For randomization procedures please see the corresponding section of the procedures manual. Only one type of intervention will be performed in one school in order to avoid confounding effects.



Geographical distribution of schools and interventions



- ★ ProfScreen
- ★ QPR
- ★ Awareness
- ★ Control



SEYLE: CASE-FINDING BY SCREENING

High Risk Emergency Cases:

➤ Answered YES to:

- Seriously considered taking ones life or made plans AND/OR
- Made as attempt in the last two weeks



Assessing Prevention Strategies

1. Educational program
2. Gatekeepers training
3. Screening





Awareness materials

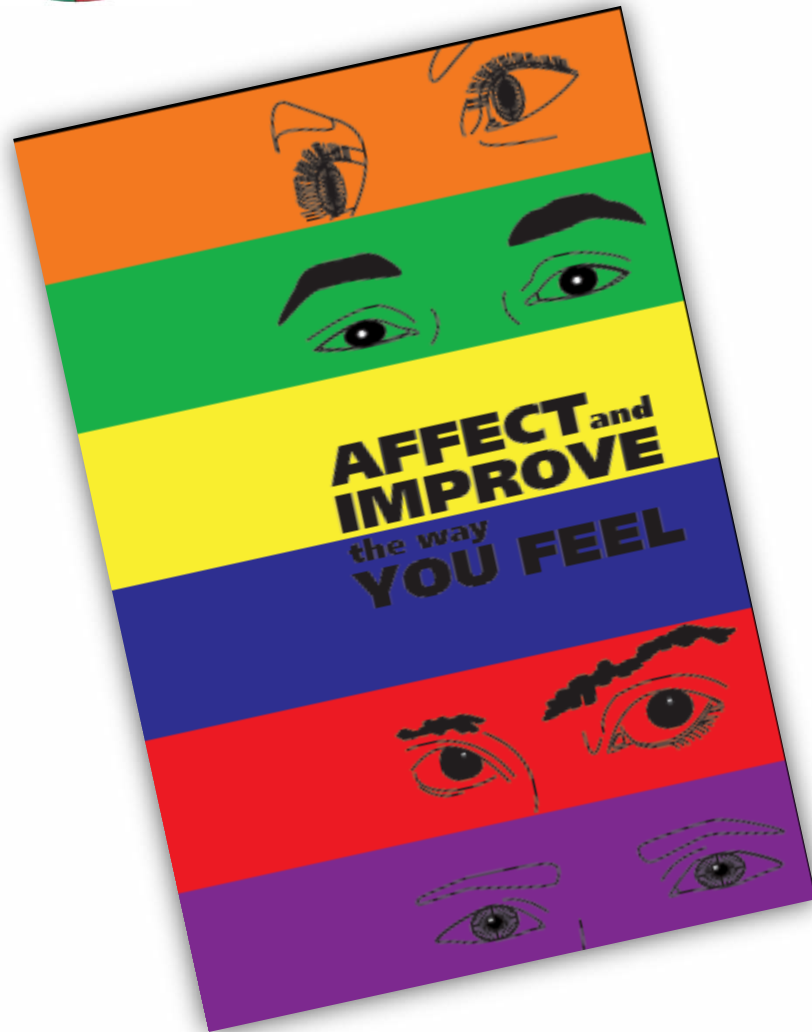
- awareness increasing booklet and posters
- lectures and role-play sessions

Topics:

- Healthy lifestyles, stress, crisis, depression, suicidal behavior
- Self-help, how to speak with a troubled friend and seeking help
- Contact information



SEYLE Awareness Booklet



Part 3: Stress and Crisis

Do you feel stressed?

Anything that makes you feel excited or uneasy is a source of stress. Stress and crisis can affect anyone.

Examples of things that can cause stress include:

Parents divorcing or being unemployed, the death of a family member, breaking up with a girlfriend/boyfriend, moving to a new school, city or country, classmates who think you are silly or weird, being bullied, grief, being discriminated against, too much school work and teachers who seem not to understand you.

Is stress always bad?

There are two basic types of stress:

+ POSITIVE STRESS

Even things you enjoy or look forward to can be a source of stress. For example, making new friends, taking an exam, going on a first date, playing sports, going to a party--

- NEGATIVE STRESS

This comes from things you find unpleasant or threatening. For example, agonizing over a missed opportunity, over-concern about your looks and the clothes you wear, being excluded or bullied

There is no way to avoid stress completely nor would that be healthy.

Some level of stress is necessary, making you more alert and actually acting as a stimulant. But too much stress for too long has a harmful effect on your health.

Some people can cope with a great amount of stress better than others. When stress becomes bothersome you should seek advice (see the contacts in Part 6).



SEYLE Baseline results (Israel)

life time attempts (10%) (n=130)

“Have you ever spoken to anyone about your attempt”

- To parent 12%
- To sibling 8%
- To friend 31%
- **To no one 27%**
- **(vs. 30 -60% -Shaffer, 2010)**



Assessing Prevention Strategies

1. Educational program
2. Gatekeepers training
3. Screening





A Gatekeeper

Is anyone in a position to recognize a crisis and warning signs that someone may be contemplating suicide.



EDUCATE TEACHERS AS GATE KEEPERS BY:

QPR

Question, Persuade, Refer

Ask A Question, Save A Life



TEACHERS' EDUCATION APPROACH TO CASE-FINDING

(GATEKEEPERS TRAINING)

— PROBLEMS —

- Many suicidal teens do not show warning signs **false negatives**
- Many warning signs not specific for suicidality **false positives**



Assessing Prevention Strategies

1. Educational program
2. Gatekeepers training
3. Screening





Baseline Evaluation Israeli Preliminary Data

	Professional (full) Screening	QPR	Awareness	Control	Total
Total n	304	331	278	318	1231
Basic two questions screening: % of pupils at high risk for suicide	8.6%	9.1 %	8.3%	10.1%	9%
% of additional at risk pupils identified (by Intervention)	62.2%	0.65%	0%	0%	15.8%



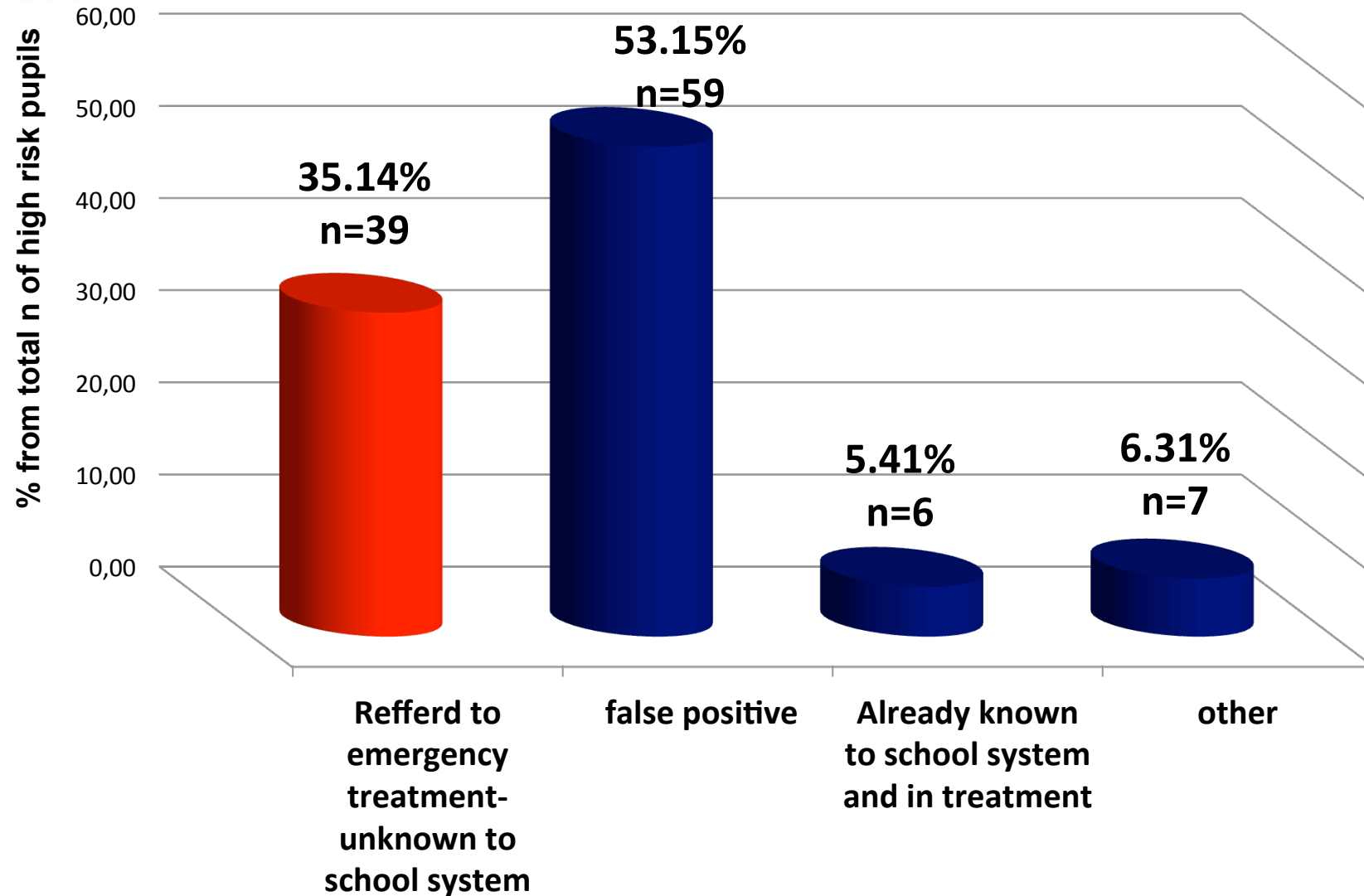
Case Finding Results

Preliminary cross-cultural data

	Professional (full) Screening	QPR	Awareness	Control
Israel	62.2%	0.65%	0%	0%
Hungary	52,94%	0%	0%	0%
Ireland	24.2%	0.24%		

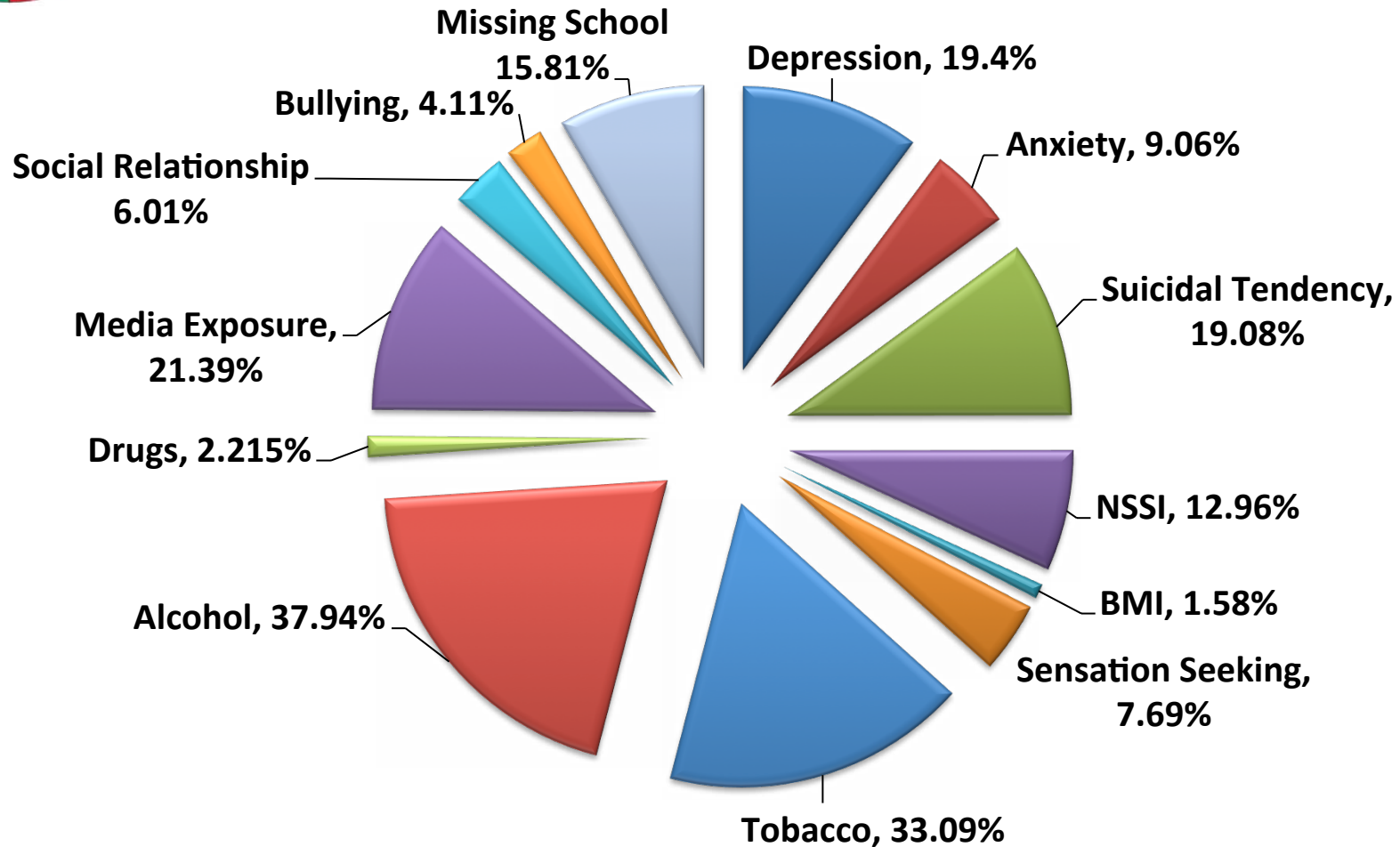


SEYLE Results: Referral of high risk for suicide subjects in Israel (n=111)





At Risk Pupils Identified by Screening* In Screen Arm Only



* Each piece of the pie refers to percentage of pupils that were above the screening cut off for a specific issue from the total number of pupils screened. Since there is overlap pupils can have multiple issues and the total of this pie is over 100%.



SCREENING: TWO-QUESTION APPROACH

- **Have you ever tried to kill yourself?**
- **Have you thought about killing yourself in last three months?**

(Similar to Emergency cases in SEYLE)



Conclusions

- Suicide attempts often occur in secret
- These might be the most dangerous types
- The focus on impulsive aggressive attempters may result from over- focus on the ER
- Proactive screening in schools is possibly the best method of case finding
- Screening over – sensitivity may be redressed by a 2-question approach