# Avalanche accidents in Italy



Livigno 20 January 2015

### Season 2014-2015

winter 2014-2015 italian Alps - summary:

- strong wind for long periods
- below 2000 m: low amount of snow
- above 2000 m: snowfalls on average but irregolar snowcover (eroded/accumulations)

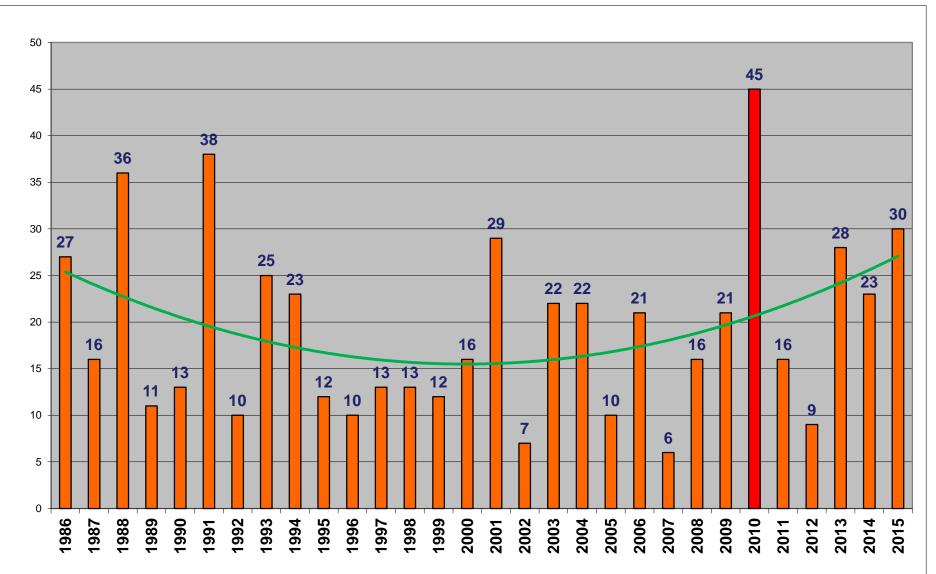


### avalanche danger:

- winter not critical for spontaneous avalanches
- very critical for skiers/mountaineers:
  - extraordinarily long period (between January and February) with deep persistent slab along all the Alps
  - low probability to trigger but big consequences;
     hard to communicate effectively to the public (risk to cry "wolf")

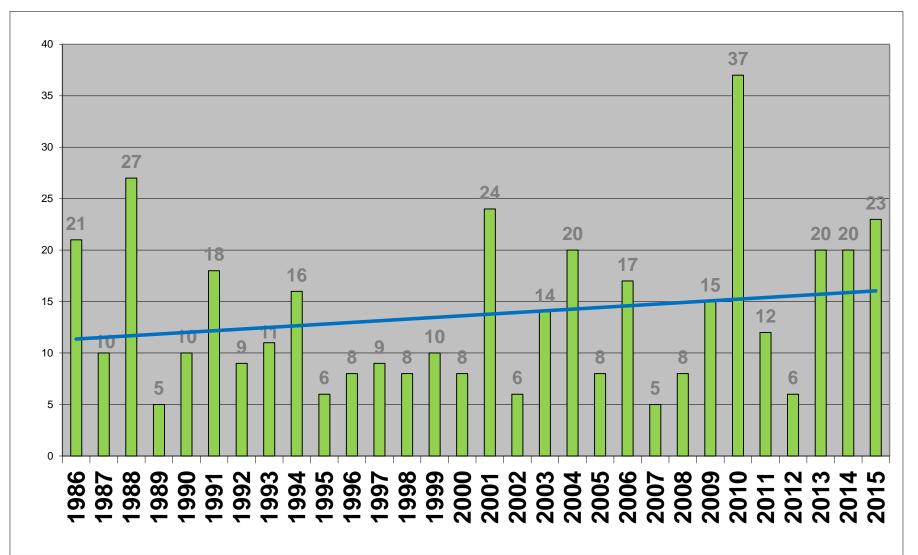
## Avalanche victims in Italy 1986-2015

In Italy on average (linear media) 19 persons die every year in avalanche fatalities



# Avalanche fatalities in Italy 1986-2015

In Italy on average there are 14 avalanche fatalities each season

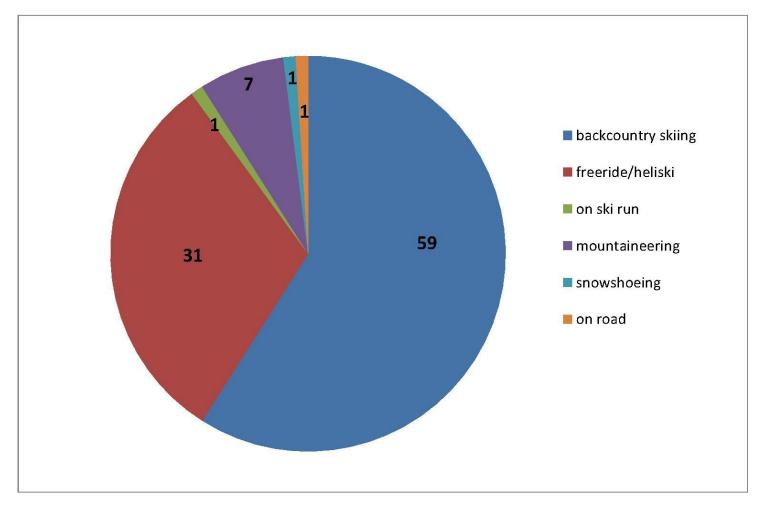




# Victims in Italy by Regions season 2014/2015



# Avalanche accidents rate by category in Italy 2014-2015



# Avalanche victims by category 2014-2015

30 victims:

- 18 backcountry skiing (10 ascent, 8 descent)
  - 9 off piste skiing/heliskiing
  - 2 mountaineering
  - 1 snowshoeing

# Problems highlighted in this season:

- many accidents in which several people were caught at the same time :
  - 3 accidents with 6 persons caught
  - 1 accident with 5 persons caught
  - 5 accidents with 4 people caught

Self rescue inefficient or impossible

Hard work for rescue team

 4 heliski serious accidents in Aosta valley, Piemont and Lombardia

with 3 dead and 4 injured

# Problems highlighted in this season:

- Several people deployed airbag but totally buried, because:
  - slope too short
  - airbag balloons destroyed or backpack airbag disconnected from the person

#### 2 accidents with people without beacon, shovel and probe:

- 6 local backcountry skiers caught: 1 without beacon
- Suiss family snowshoeing, all without beacon: 1 caught and dead;





#### deep persistent slab

any al (1) 22

#### about 30 ski tracks

(morning and yesterday evening)



#### 8 February 2015

helicopter crashed

#### avalanche lenght max 2300 m



thickness of accumulation 4-6 m



strong wind during landing

1 USA skier caught: deploy airbag, partially buried, ininjured.
1 USA snowboarder caught: airbag not deployed, totally buried, injured
Companion rescue (USA and FR mountain guides)



#### deep persistent slab

#### Helicopter crashed

#### Aosta valley – Testa dei Fra 18 January 2015





deep persistant slab + terrain trap =
depth buried 7 m

#### Rescue:

10 companions + 22 rescuers

Rescue helicopter arrived after 10'. buried extracted dead after 1h50'



# Schneespitze accident – 06 January 2015

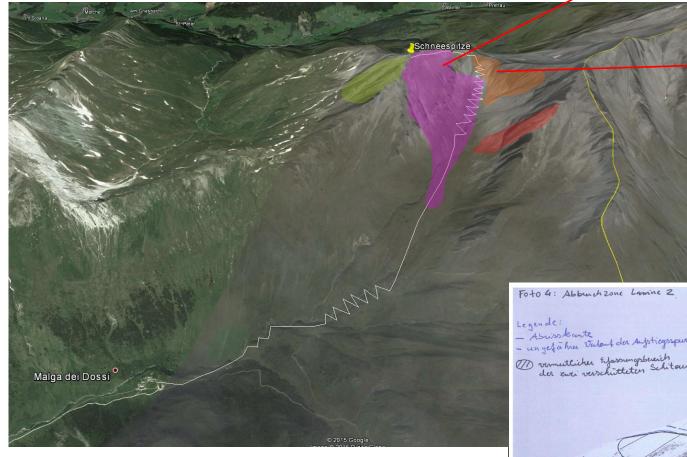
more than 35 people on the track

hard wind accumulation

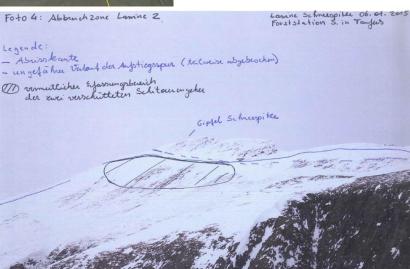
before the avalanche...

#### Schneespitze accident – 06 January 2015

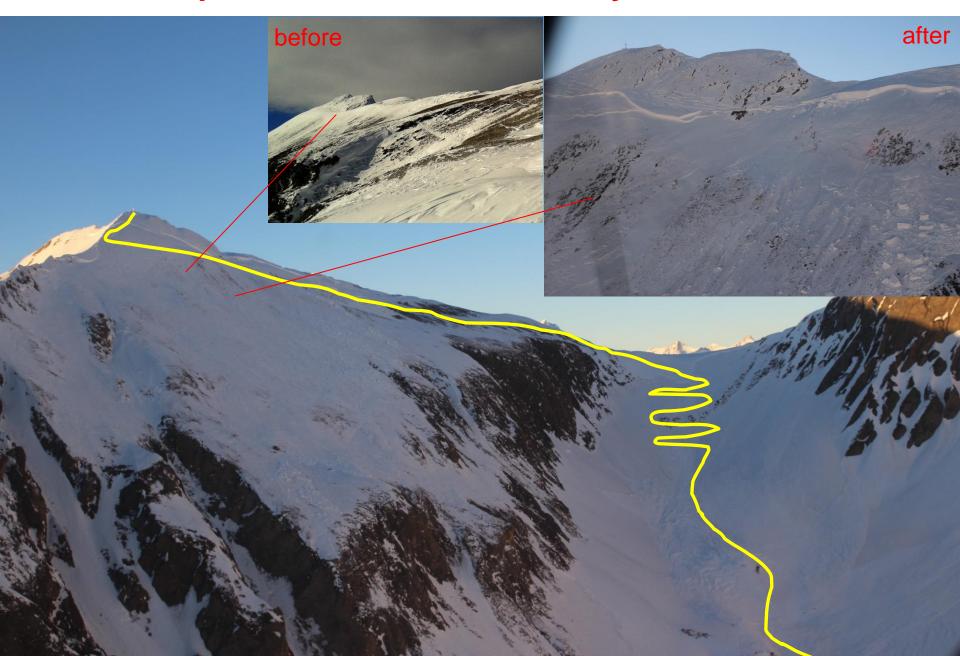
6 local skiers caught, 2 buried and dead (1 without beacon)



A lot of people in the area: big rescue operation with some elicopters and more than 100 rescuers. Secondary avalanche 3 people sitting in a pass: 2 caught and buried. Succesful companions rescue



#### Schneespitze accident – 06 January 2015



#### ACCIDENT TERRA NERA – 27 MARCH 2015

#### Piedmont Region Susa valley:



- 15 heliskiers start h 10.00
- Conditions: t -8°C; wind moderate
- 25-30 cm of fresh snow in the last 3 days
- 3 skiers caught: 2 dead and 1 injured
- 1 skier open airbag but balloons exploded during the slide (600 vertical meters)

#### Pila 9 February 2015

for further informations: aineva@aineva.it