



**First results on**

**video meteors**

**from**

**Crete**

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# *why video recording ?*

- > Continuous coverage (no food, sleep, rest, etc)
- > Accurate determination of meteor characteristics
  - position
  - magnitude
  - time
  - speed
- > Large sample (good statistics)
- > Double or multi – station observations  
(determination of: radiant, 3D position of meteor, trajectory, orbit)
- > Fireballs  
(determination of trajectory > meteorite recovery)
- > Technology advance = affordable solutions (~300-500 €)
  - sensitive CCTV cameras
  - mature software (UFO Capture, MetRec)

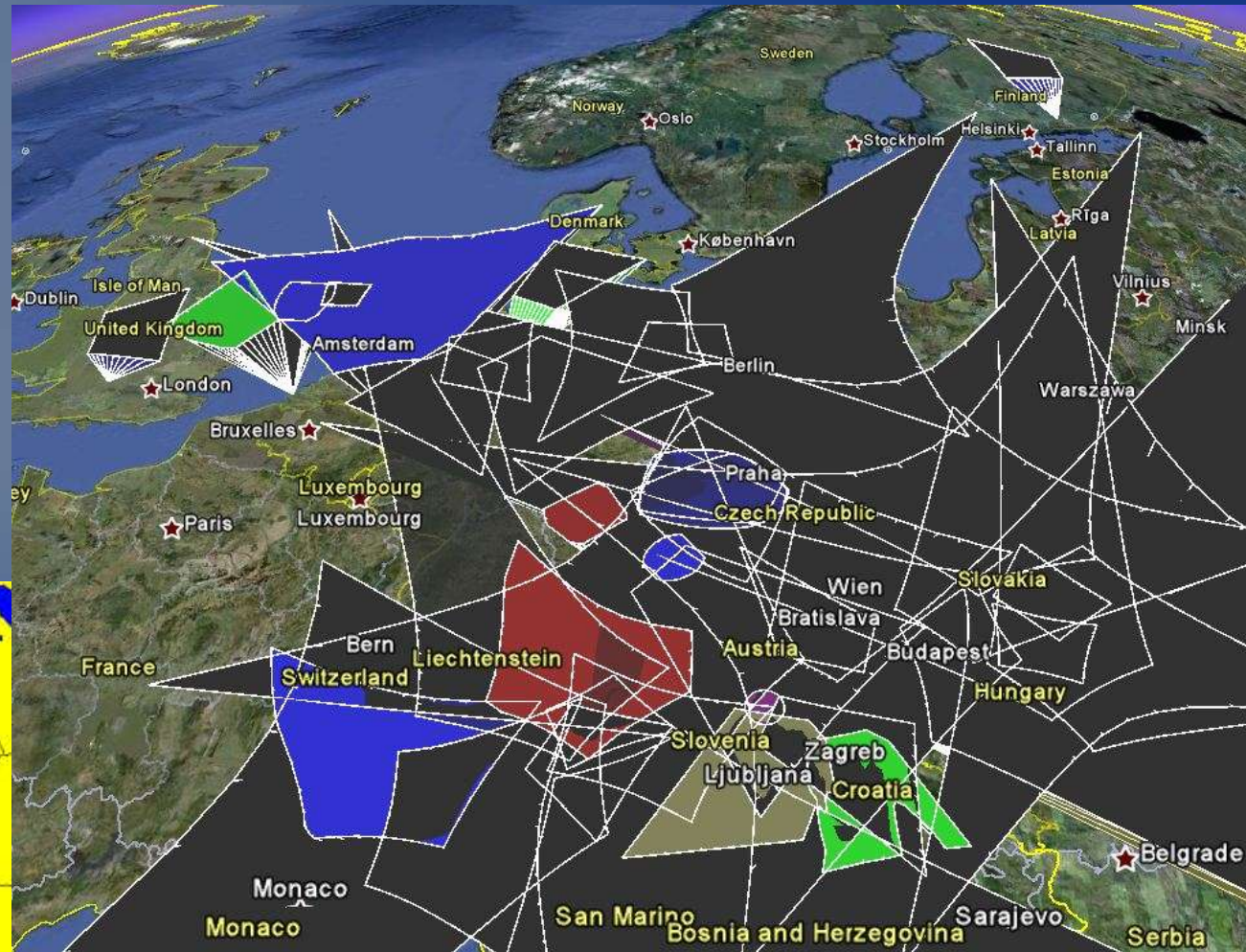


# IMO's video network

Greece ??

2-3 systems known to operate but ...

- not permanent
- outside IMO



imonet.org

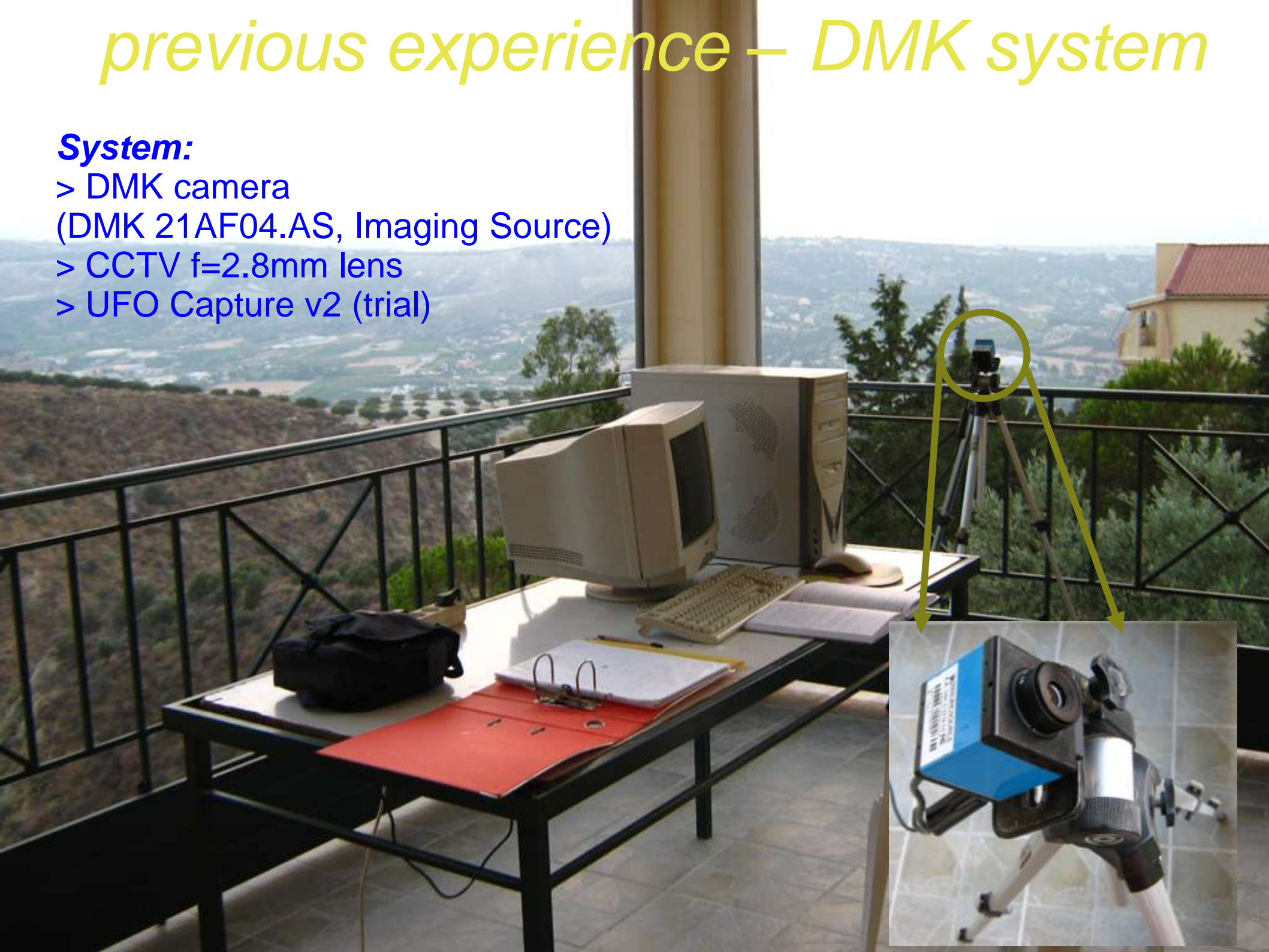




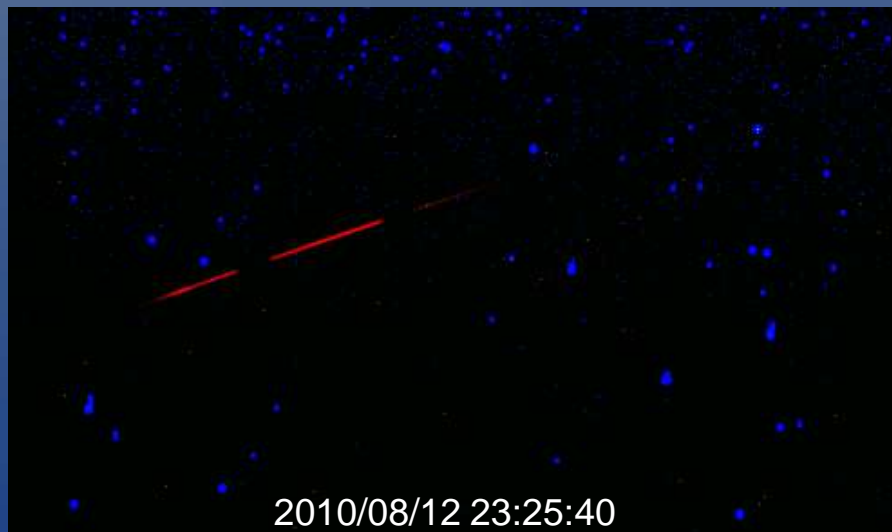
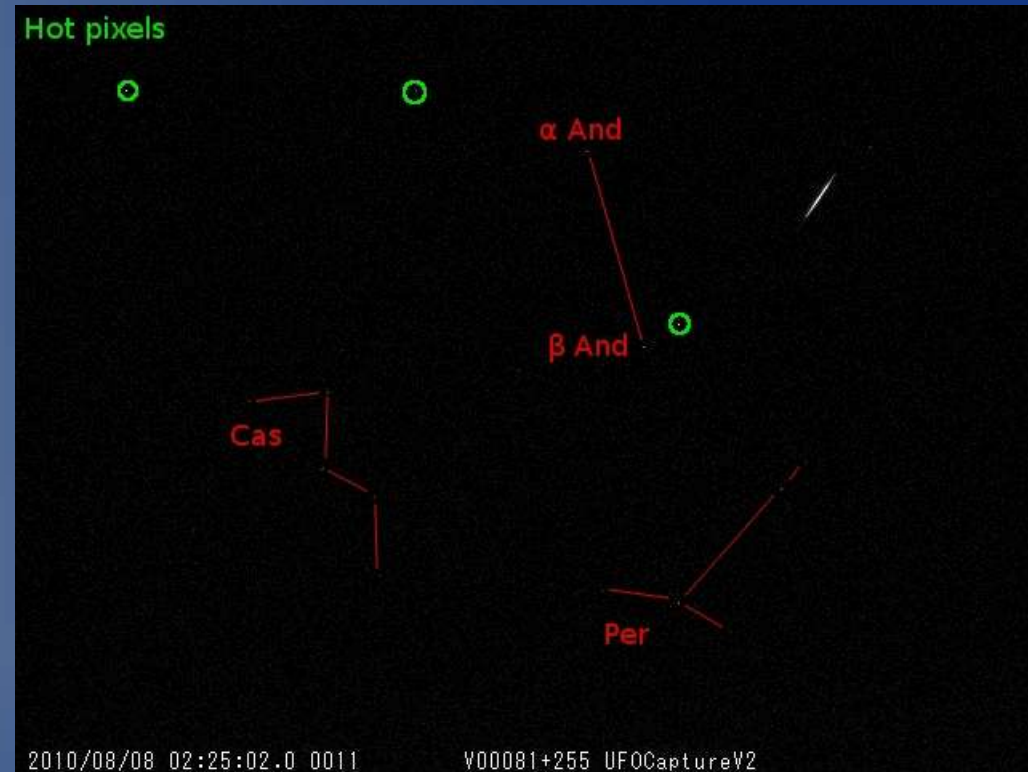
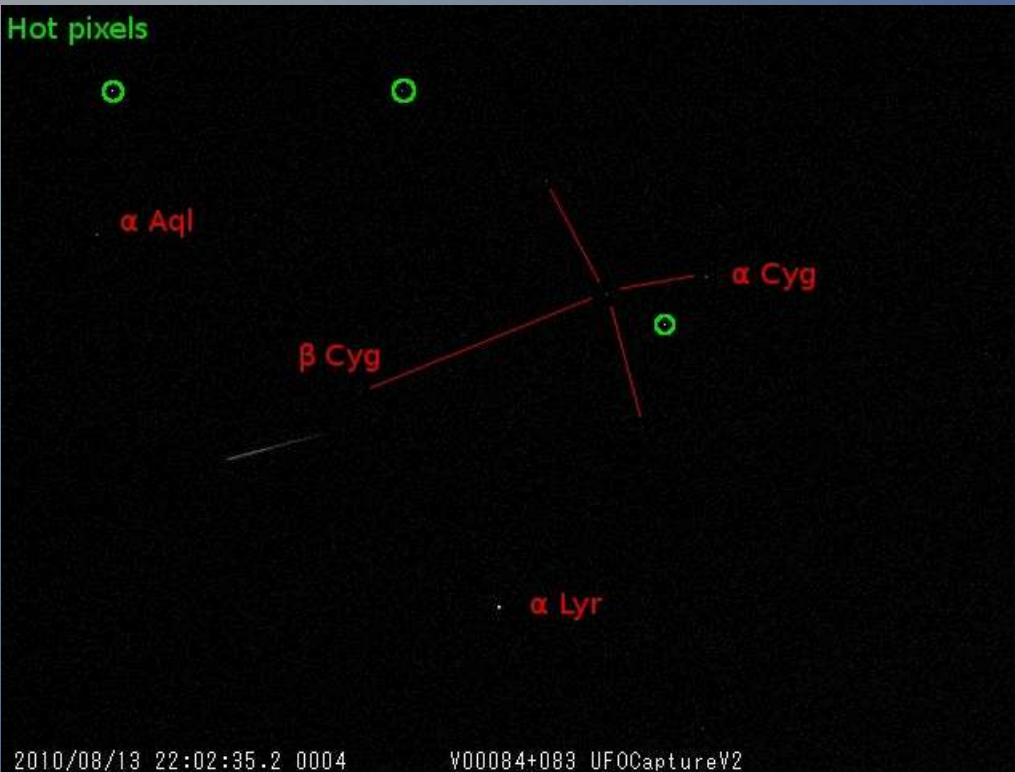
# *previous experience – DMK system*

## **System:**

- > DMK camera  
(DMK 21AF04.AS, Imaging Source)
- > CCTV f=2.8mm lens
- > UFO Capture v2 (trial)



# results with DMK system



## Results on Perseids 2010:

- > 17 nights
- > 28 meteors
- >  $lm \sim 2-2.5$  mag
- > system works !

# thinking of a new system



- purchase cost (~160 €)
- many parameters
- no connection with IMO
- post-processing analysis

- + easy installation
- + compatible with all hardware/software
- + analyzing tools
- + not meteor use only

- written for Matrox Meteor family video grabbers only
- compatible with DOS / Win XP
- runs under DOS commands

- + easy installation
- + automatic detection & characterization
- + custom made for meteors
- + post processing tools
- + connection with IMO



*and the winner is ...*

**System:**

- > Watec 902 H2 Ultimate  
(0.0001 lx F1.4 / 0.000033 lx F0.8)
- > Panasonic 12mm, f/0.8
- > MetRec



# *preliminary numbers*

## *Test period (8 nights):*

Total obs time: 44.8 h

Total obs meteors: 205

Total shower members: 48 (~24 %)

PER = 6

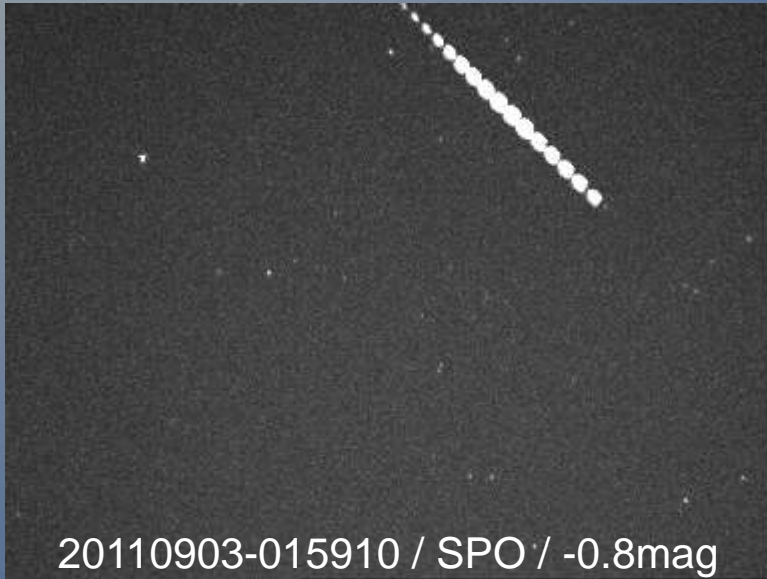
AUR = 19

ANT = 23

*Observations during 19 Aug - 3 Sep  
AUR max @ 1Sep*

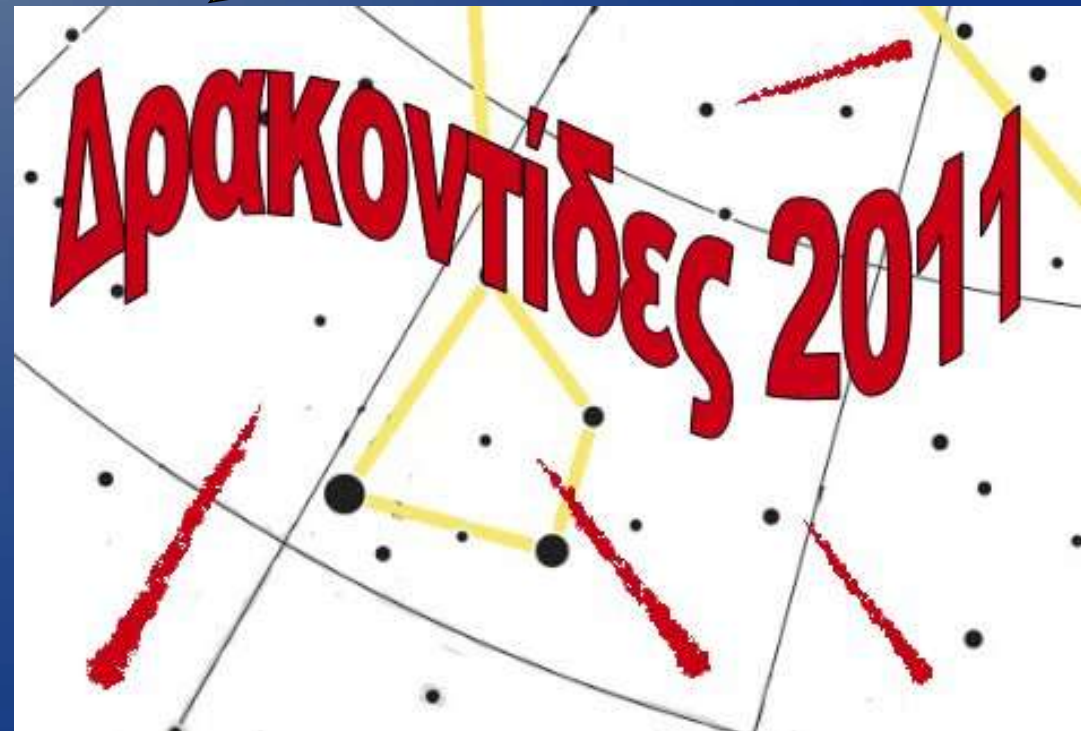
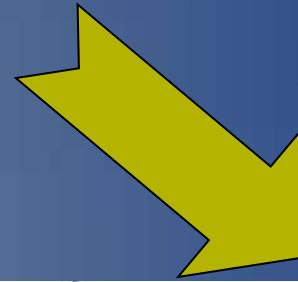


# *meteors captured*



# *future plans*

- Accomplish full operational status
- Build necessary housing for permanent use
- Take advantage of the Draconids 2011 !!



***Website:***

***[drakontides2011.wordpress.com](http://drakontides2011.wordpress.com)***

# drakontides 2011-the greek campaign



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*International Meteor Organization*

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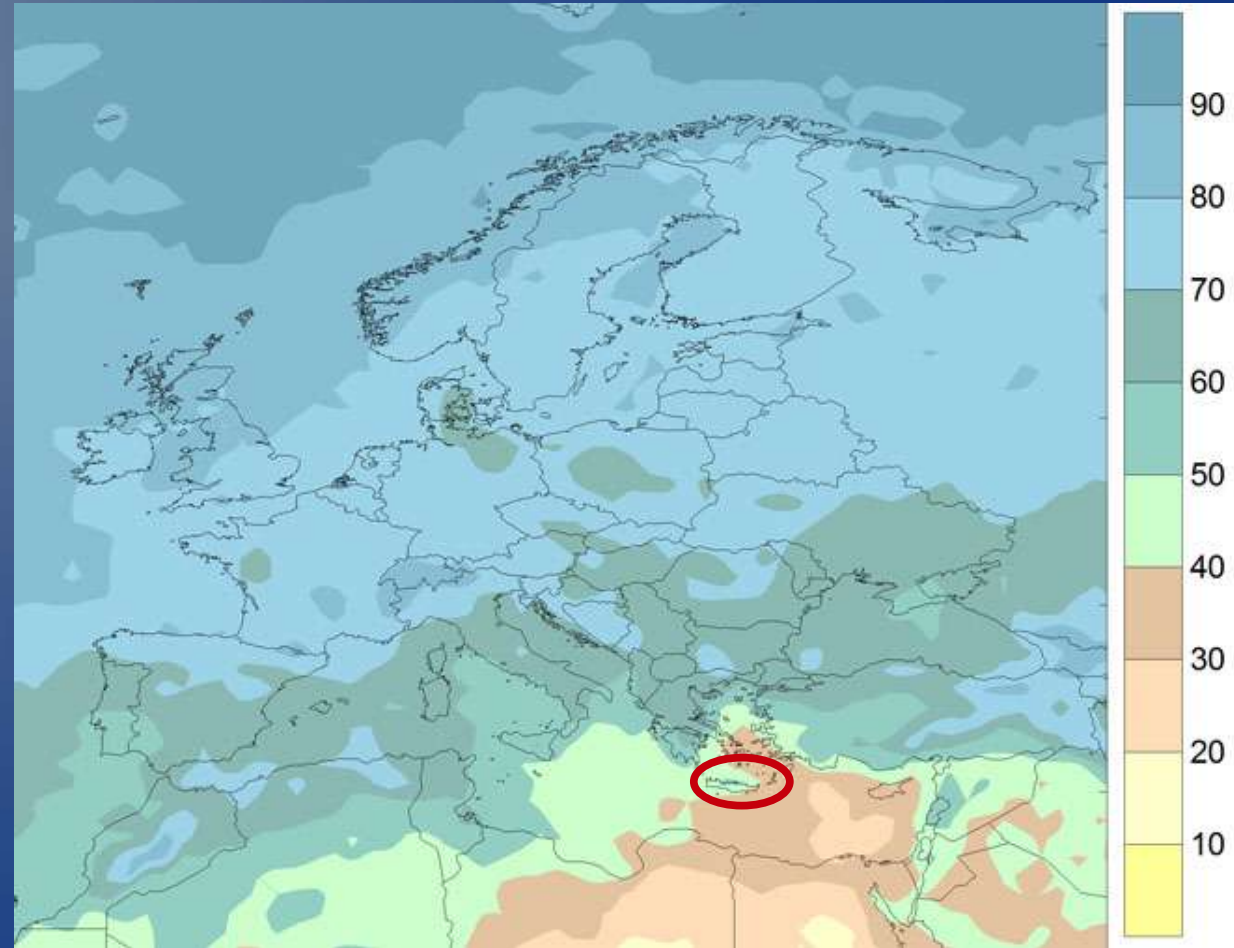
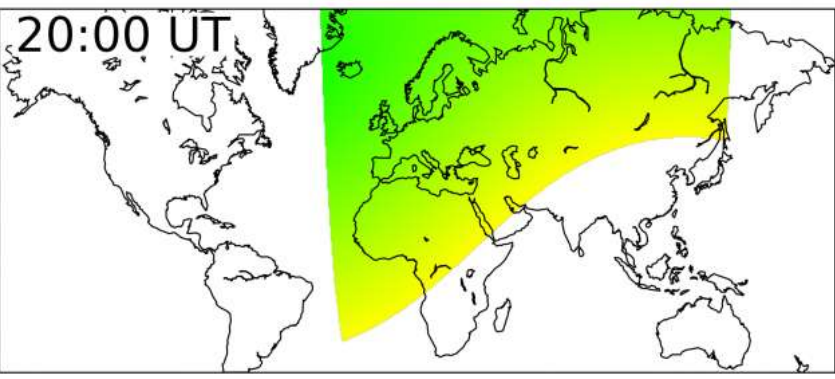
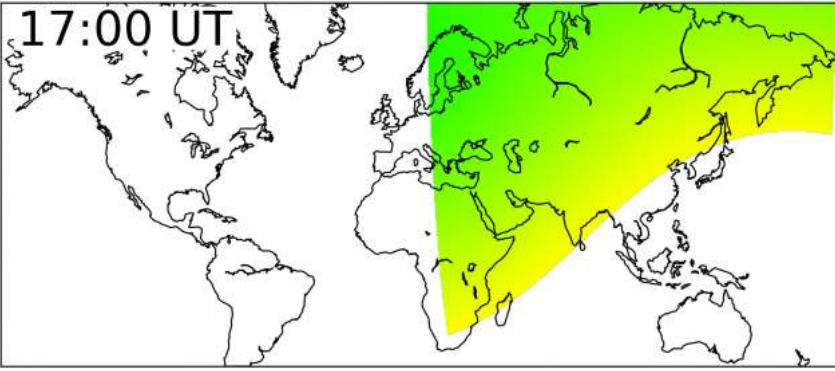
*International Meteor Organization*

## **Aims:**

- > acquire double/multiple station obs**
- > acquire VLF obs**
- > test new methods**
- > acquire visual data**



# the case of Greece - Crete



[www.imo.net/draconids2011](http://www.imo.net/draconids2011)

# possible stations





*you are welcome to join!*



Libritis  
Giorgos





# acknowledgements

## *DMK system:*

- > Strikis Iakovos-Marios
- > Christou Apostolos
- > Maravelias Evaggelos

## *Watec system:*

- > Sirko Molau
- > Christou Apostolos
- > Tsamis Vagelis

## *Support*

