



January 20, 2010

President of the Administrative Board, CENELEC

Mr. David Dossett  
17, Avenue Marnix  
B-1000 Brussels, Belgium

Re.: ESE National Standards in conflict with approved EN standards

Mr. President,

By way of introduction, I am Professor and Chair of the Electromagnetic Engineering Division of the Royal Institute of Technology (KTH), Stockholm, Sweden. In addition I am also the Chair of the European COST Action P18 "The Physics of Lightning Flash and Its Effects", an Action initiated in 2005 with the objective of increasing the knowledge of the physics of the lightning discharge and of its effects on natural and man-made systems. About 40 Institutions from 21 European Countries participate to the activities of the Action. In addition, the Action counts 8 Institutions from NON-COST countries, including Canada, Japan, and USA.

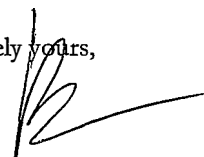
The activities of the Action were organized into 5 Working Groups covering various aspects of lightning physics and effects, including a working group dealing with the physics and models for the lightning attachment to objects. Within this working group, the so-called non-conventional lightning protection technologies, including ESE, were analyzed by expert scientists in the field of lightning and lightning protection. The study confirms that

- From a theoretical point of view, the ESE concept is based on inconsistent scientific hypotheses.
- The early initiation of leaders from ESE terminals observed in the laboratory cannot take place under natural conditions.

We understood that CENELEC has invited the French National Committee to present a converted version of their National ESE standard to be introduced as a Product Standard.

It is the opinion of the COST Action P18 that

- (i) The French National Standard NF C 17 102 is in conflict with the European Lightning Protection Standards EN 62 305 (1-4) and should have been withdrawn.
- (ii) The conversion of such a standard to a European Product Standard would not make any sense.

Sincerely yours,  
  
Prof. Rajeev Thottappillil  
COST P18 Action Chair

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