# COST EFFECTIVE SOLUTIONS TO YOUR LIGHTNING PROTECTION NEEDS





#### PROTART-60 ESE LIGHTNING CONDUCTOR



PROTART-60 ESE LIGHTNING CONDUCTOR is manufactured from high quality stainless steel which makes it durable against the toughest weather conditions.

When there is change in the electro magnetic field in the atmosphere, the ion generator inside the PROTART-60 ESE terminal begins to release positive ions in to the atmosphere which attracts the lightning emissions on to the ESE rod. Standard product does not come with an adaptor. The adaptor rod has 30mm diameter with a 25mm internal diameter but we are able to manufacture rod adaptors to the customers requirement. Our product is certified from Middle Eastern Technical University in NFC 17.102 Annex C. You are able to find all the dimensional information regarding PROTART-60 ESE inside the relevant NFC 17.102 test report.

<b>Product Code</b>	Material	$\Delta$ T: NFC-17 102 Test Results	Packing Dimensions(Cms)	Weight (kg)	
PROTART-60	Stainless Steel	ΔT: 72 μs	37x22x12	2,32	

#### **PROTART-45 ESE LIGHTNING CONDUCTOR**



PROTART-45 ESE LIGHTNING CONDUCTOR is manufactured from high quality stainless steel which makes it durable against the toughest weather conditions.

When there is change in the electro magnetic field in the atmosphere, the ion generator inside the PROTART-45 ESE terminal begins to release positive ions in to the atmosphere which attracts the lightning emissions on to the ESE rod. PROTART-45 ESE rod is a unique product in a sense that it's measured  $\Delta T$  is 57  $\mu$ s which is also making it suitable for the requirements for an ESE rod with a  $\Delta T$ : 45  $\mu$ s proving a wide coverage. Standard product does not come with an adaptor. The adaptor rod has 30mm diameter with a 25mm internal diameter but we are able to manufacture rod adaptors to the customers requirement. Our product is certified from Middle Eastern Technical University in NFC 17.102 Annex C. You are able to find all the dimensional information regarding PROTART-45 ESE inside the relevant NFC 17.102 test report.

<b>Product Code</b>	Material	$\Delta$ T: NFC-17 102 Test Results	Packing Dimensions(Cms)	Weight (kg)	
PROTART-45	Stainless Steel	ΔΤ: 57 μs	37x22x12	1,98	

#### PROTART-30 ESE LIGHTNING CONDUCTOR



PROTART-30 ESE LIGHTNING CONDUCTOR is manufactured from high quality stainless steel which makes it durable against the toughest weather conditions.

When there is change in the electro magnetic field in the atmosphere, the ion generator inside the PROTART-30 ESE terminal begins to release positive ions in to the atmosphere which attracts the lightning emissions on to the ESE rod. PROTART-30 ESE rod is a unique product in a sense that it's measured  $\Delta T$  is 57  $\mu$ s which is also making it suitable for the requirements for an ESE rod with a  $\Delta T$ : 30  $\mu$ s proving a wide coverage. Standard product does not come with an adaptor.The adaptor rod has 30mm diameter with a 25mm internal diameter but we are able to manufacture rod adaptors to the customers requirement. Our product is certified from Middle Eastern Technical University in NFC 17.102 Annex C. You are able to find all the dimensional information regarding PROTART-30 ESE inside the relevant NFC 17.102 test report.

#### **PROTECTION RADIUS TABLE**

Rp (m)	PROTART-30 ΔL: 30m ΔT: 30μs			PROTART-45 ΔL: 45m ΔT: 45μs			PROTART-60 ΔL: 60m ΔT: 60μs					
h (m)	Level I	Level II	Level III	Level IV	Level I	Level II	Level III	Level IV	Level I	Level II	Level III	Level IV
2	19	22	25	28	25	28	32	36	31	35	39	43
4	38	44	51	57	51	57	64	72	63	69	78	85
5	48	55	63	71	63	71	81	89	79	86	97	107
6	48	55	64	72	63	71	81	90	79	87	97	107
8	49	56	65	73	64	72	82	91	79	87	98	108
10	49	57	66	75	64	72	83	92	79	88	99	109
20	50	59	71	81	65	74	86	97	80	89	102	113
30	50	60	73	85	65	75	89	101	80	90	104	116
60	50	60	75	90	65	75	90	105	80	90	105	120



## Certificate of Registration

#### Protart Bilisim Tekn. ve Dis Tic. A.S.

Address Halaskargazi cad. No:141/7 Room: A Sisli/Istanbul/TURKEY

Assessment Methods Low Voltage Directive (LVD) 2006/95/EC

Product Name ESE Active Lightning Rod

Models Protart-30 ESE Active Lightning Rod

Protart-60 ESE Active Lightning Rod Protart-45 ESE Active Lightning Rod

Harmonized Standards TS EN 62305

UNE 21186 NFC 17.102

Report Number 14-03-01-511 (B) and 14-03-01-511 (A)

Issue Date 14 January 2017 Expiry Date 14 January 2018

Certificate No AP/MD/2015-06-004/ Rev:01

Approver

Have been formally assessed by Aplus Certification and found to comply with the requirements of Low Voltage Directive (LVD) 2006/95/EC

The present certificate is valid just for the analysed product design. The certificate shall lose its validity in case of any changes in the product.





Sertifika üzerinde herhangi bir değişiklik yapılamaz veya tahrif edilemez; kasıtlı olarak kötüye kullanımı, haber verilmeksizin iptaliyle sonuçlanacaktır.

## **SAMPLE OF INSTALLATIONS**











#### **PRO TESTER**

#### LIGHTNING CONDUCTOR TESTER

With PRO TESTER, you are able to determine if there is a short circuit or a fault in the ion generator immediately by simply screwing in the special plug at the end of the cable to the ESE rod and pressing the button on the testing device. We are able to make the cable length on the testing device according to the customer's requirements.



#### **PRO LSC**

#### LIGHTNING STRIKE COUNTER

PRO LSC works based on the inductive field principle of the lightning strike, when a lightning strike occurs and as the current travels through the down conductor; it operates the transformer device which advances the analog counter by a digit which is visible on the facade of the product.



## **Technical Specifications**

6 digit analog counter (Non-Resetable)

Detecting currents from 2 to 100 kA.

Is not subject to an external power supply.

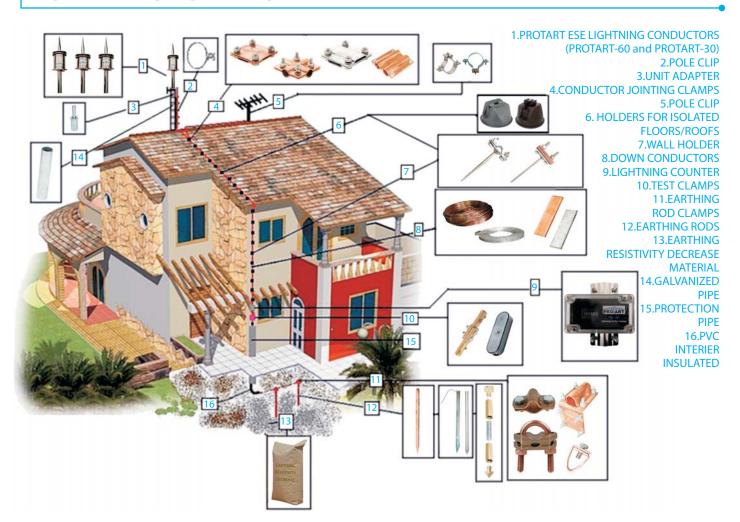
Simple assembly.

Dimensions: (Length) 11.5 cm X (Width) 6.5 cm X (Heigth) 5.5 cm

#### **PROTART EARTHING MATERIALS**



## **INSTALLATION DETAILS**



### **QUALITY CERTIFICATES**









## **PERFORMANCE CERTIFICATES**







