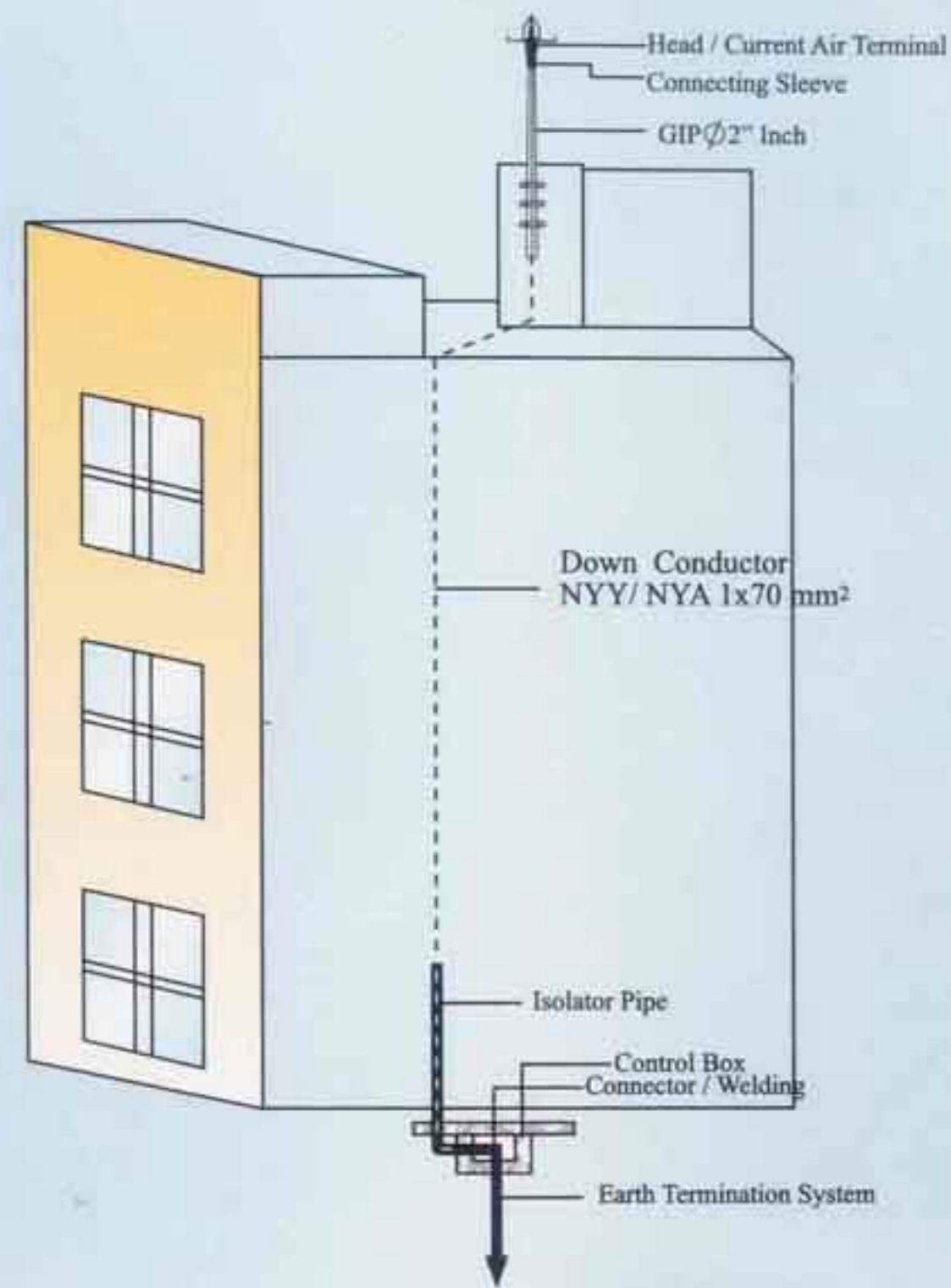
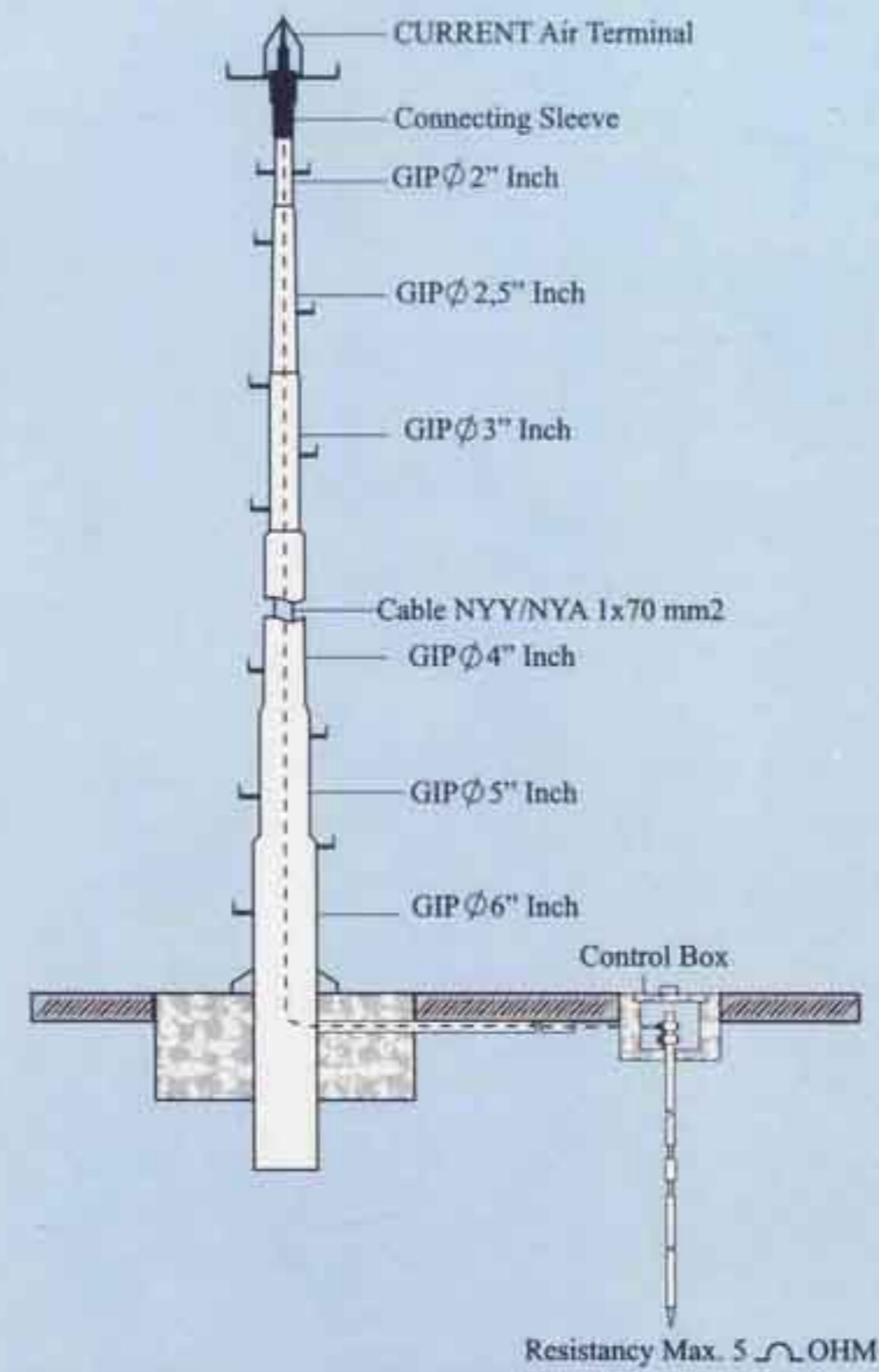


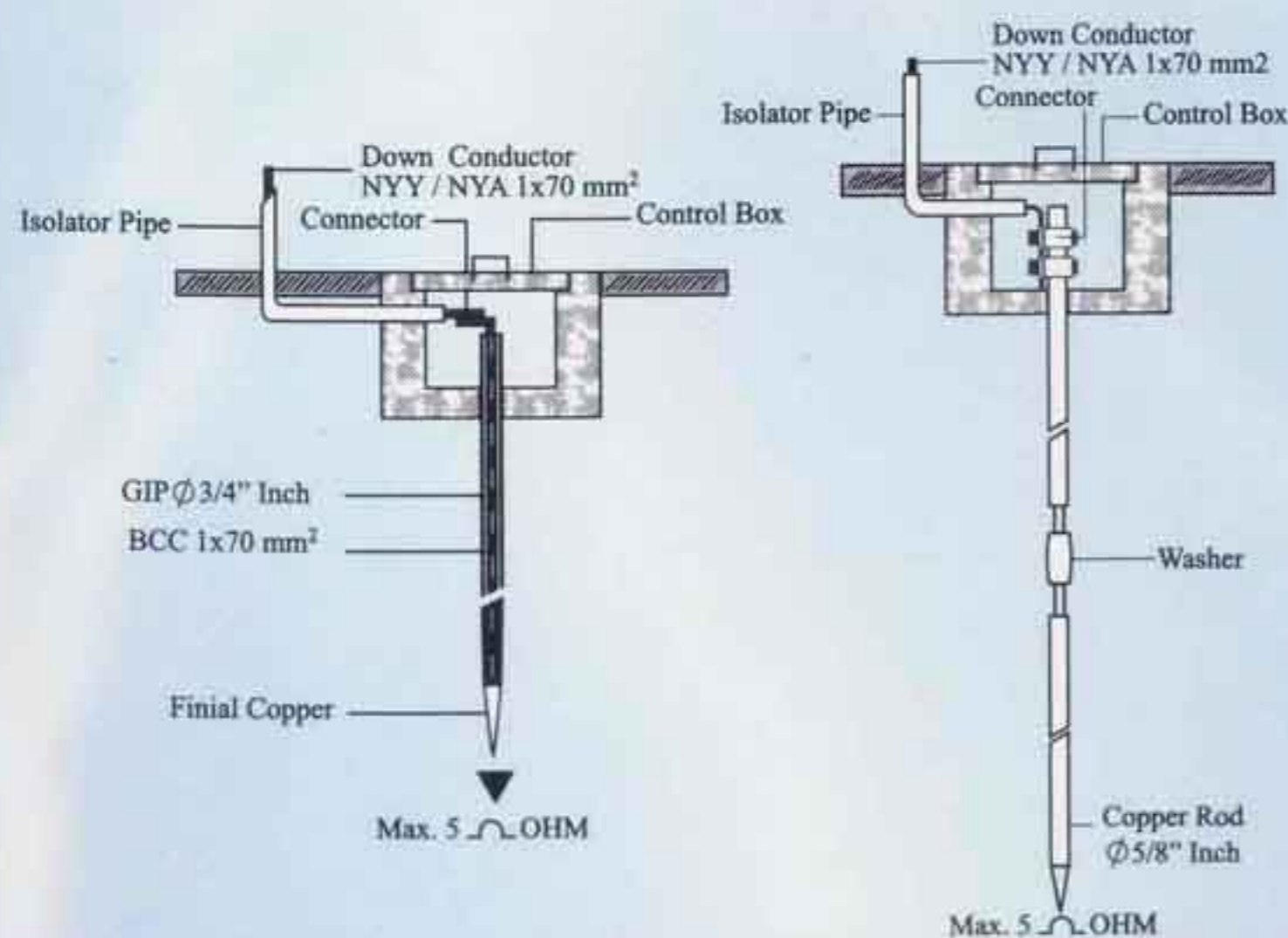
## Installation At High Building



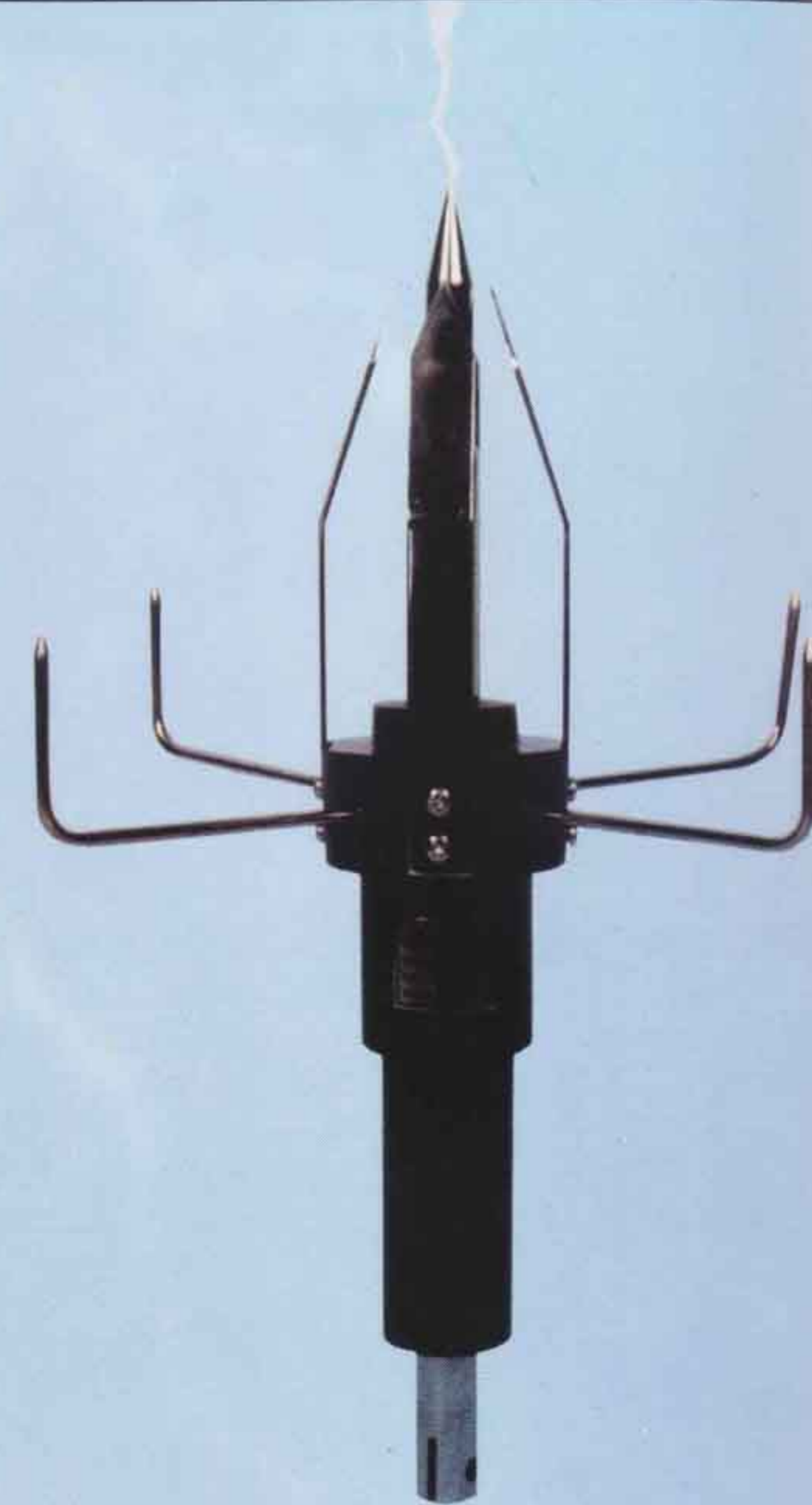
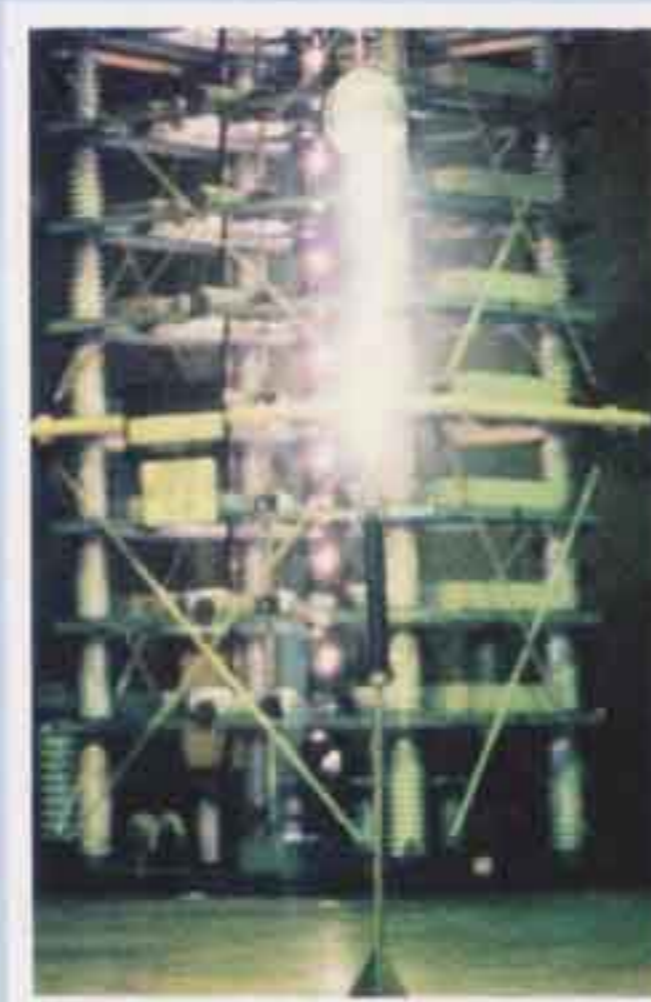
## Single Mast Installation



## Grounding System Alternatif



## LMK Laboratory Test



**"CURRENT" LIGHTNING PROTECTION**

**ELECTROSTATIC SYSTEM**



## I. Introduction

- "CURRENT" lightning protection system, is an external lightning protection system technology.
- This lightning protection system, is a lightning protection system that can create ionization area or in other words. It is also referred to as ionizer dissipation system.



- In every ionization area, discharge to cloud creates potential difference between cloud and earth surface, therefore electrical discharge from "CURRENT" at the lowest level may continuously occur through the conductor.

- Continuous creation of electrical discharge waves may minimize lightning strike.
- "CURRENT" Terminal, may create static field against electrical charge difference through corona effect from the Terminal Head.
- Release of positive ion at "CURRENT" terminal may create quite wide protection area.



- Potential difference between cloud and earth, may create quite significant electrical charge at "CURRENT" terminal, hence at a certain time, electrical charge will be pulled against cloud electrical charge and the concentrated at strike point at Copper Terminal Head, and distributed through conductor to the earth.

## II. "CURRENT" Lightning Protection System Consist Of :

### 1. Head / Air Termination System

"CURRENT" Head Terminal, is the main component of this lightning protection system, serving as lightning strike arrester point to protect a certain object or area from the lightning strike hazard.

### 2. Down Conductor

It is part of the lightning protection system, serving to distribute lightning "CURRENT" from Head / Air Terminal to the earth. Therefore, Down Conductor must be streng connected directly to the grounding system (grounding electrode), by taking the shortest route. "

"CURRENT" lightning protection, required only one line Down Conductor. The Down Conductor minimum 70 mm<sup>2</sup> size.

### 3. Grounding System (Earth Termination System)

It is an inseparable part of this lightning protection system, serving to distribute / spread electrical current resulting from lightning to the earth.

- The value required for grounding system is < 5 Ohm.

## III. Advantages Of The "CURRENT" Lightning Protection System

1. Relatively wide protection area.
2. Functioning without any external power source (selfcontained working), rather than benefiting the energy in clouds.
3. Containing no-radioactive material.

4. Required only one Down Conductor : NYY /NYA 1 x 70 mm<sup>2</sup> type cable.
5. A simple system and relatively easy maintenance.
6. No interfering the beauty of building due to its aesthetic shape.

## Other Advantage :

1. Economic and relatively affordable price.

## IV. Objective / Target

- Office / factory buildings.
- Real estate / residential areas.
- Public facilities.
- Open area, etc.

## TECHNICAL SPESIFICATION OF "CURRENT" AIR TERMINAL

TYPE	LENGTH	WEIGHT	DIAMETER	PROTECTION RADIUS ( R ) MAXIMUM
CR 120 Connecting Sleeve	20 Inches 17,5 Inches	3,75 Kg 850 gram	4,0 Inches 2,75 Inches	120 meter
CR 70 Connecting Sleeve	15 Inches 13,5 Inches	2,85 Kg 650 gram	3,8 Inches 2,75 Inches	70 meter

DISTRIBUTOR :