## LIGHTING + MODULARITY Day 2 - Modernism

Tayo Oke
Zaheer Shujayee

### **Day Overview**

### Agenda

### Modernism in Design Overview

Timeline of Modernism Europe to America Design Philosophy (Bauhaus and Vigellis)

### Case Studies

Vignelli Heller Dinnerware Checho

Modern Urban Street Lights of America Modern Urban Street Lights of the EU

### Review

### **Light + Modularity Goal**

The goal of the practical design workshop is that Master students reflect on these ideas of the 20th Century regarding their involvement with today's challenges, like the energy crisis (a real threat in Europe) or global warming (a real danger in the world) and transfer these into a lighting product.

Students will be required to design a modular lighting device for the urban landscape, disseminating how modernist principles can help design a product to meet the 21st Century's challenges.

### Review



### **Settings of Urban Landscapes**

Parks

Crosswalks

Residentail

Commercial

Industrial

Highway right-of-way

Food Market

Personal Garden

**Festival** 

Camping

### **Timeline**

### Goals

Modularity of Interest Start of Ideation

### Lecture

Modularity of Interest
Configurations
Standardized Parts
Sustainability Through
Modularity
High Design Case
Studies

### Goals

Continue Ideation
Plan for Prototyping

### Lecture

Modernism
Design History
Historic Designers
Case Studies

**ERCO** 

**ERCO** 

**ERCO** 

**ERCO** 

**ERCO** 

**ERCO** 

**ERCO** 

**ERCO** 

**ERCO** 

### Goals

Mock-Ups, Design and Refinements

### Workday

### 70 S entation

### Modernism

### Timeline - Europe to America

Modernism is a philosophical and artistic movement that arose from broad transformations in Western society during the late 19th and early 20th centuries.

### **Bauhaus and Modernism**



In 1919 the Bauhaus School was founded by Walter Gropius. It is known for its revolutionary approach to design education, combining theory and practice and emphasizing integrating art, craft, and technology.



Bauhaus had a significant impact on modernism and design in the 20th century. The school's emphasis on functionalism, rationalism, and simplicity influenced modernist architecture, furniture design, and graphic design, and its approach to design education became a model for design schools worldwide.

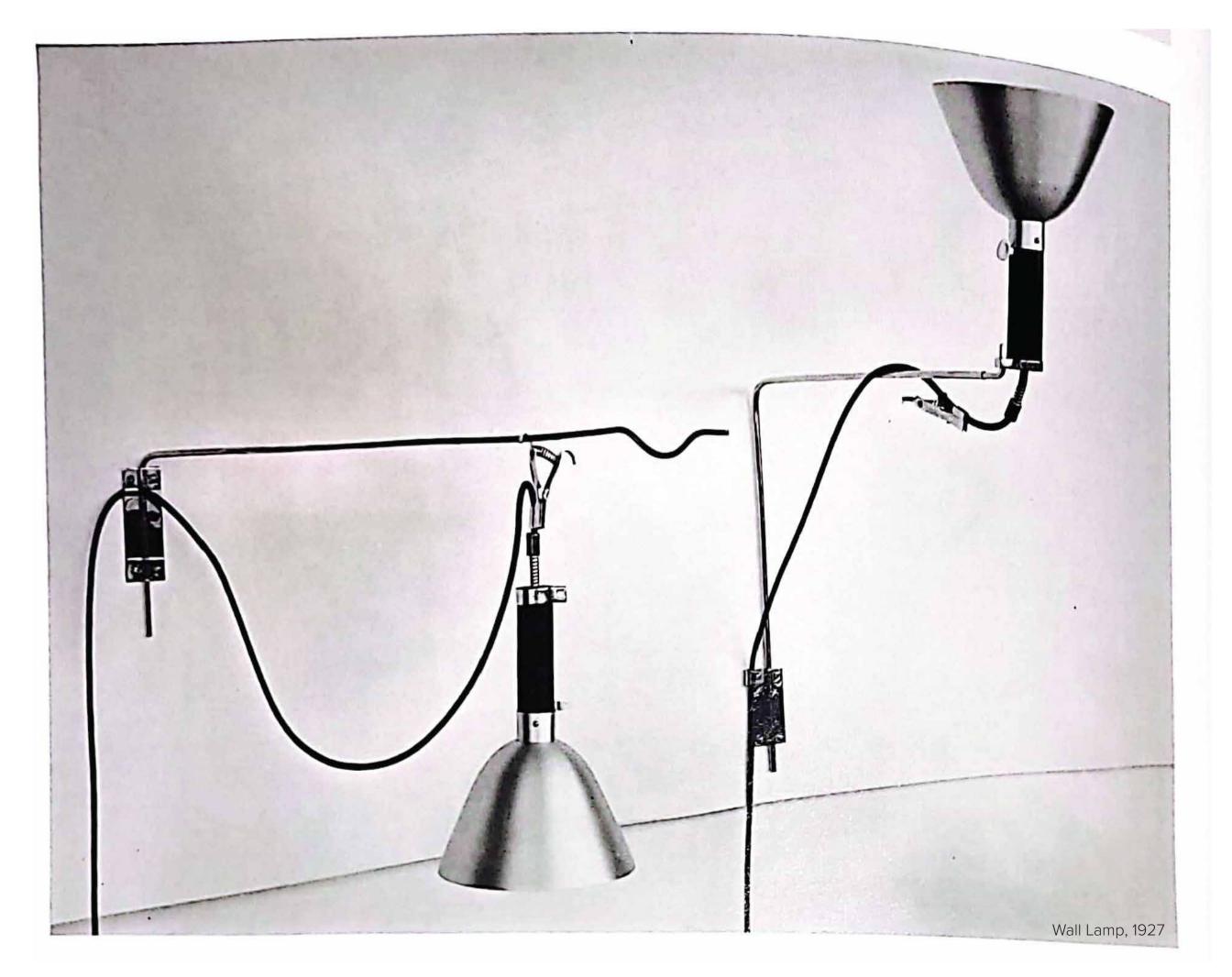
**Bauhaus and Modernism** 



Form Follows Function

This idea used simple, geometric shapes with few decorative details to design functional, straightforward, and mass-produced objects.

### Bauhaus and Modernism 19th cent - 1930s



During the polarizing time of modernism, there was an observation that machines were continuously making many products. Yet, there was a desire for products that followed the rules of form. What made the Bauhaus different was that every design came from the hand. There was a focus on simple geometrical shapes and forms.

### **Bauhaus and Modernism**



Glass
Steel
Concrete
Negative Space

"Even the walls of the space are no longer massive, momumental, a--arently permanently rooted, or in fact permanently installed. They are much more injected with air, drawn, so to speak, in space..." - Marcel Breuer

### **Marianne Brandt**





Born in Chemnitz, Germany, in 1893. Brandt's discipline was in painting, sculpture, photography, metalwork and design. Before attending the Bauhaus School, she attended a private Weimar Republic art academy. She is well known for her kettle set design and her lamp designs.

### **Marianne Brandt**

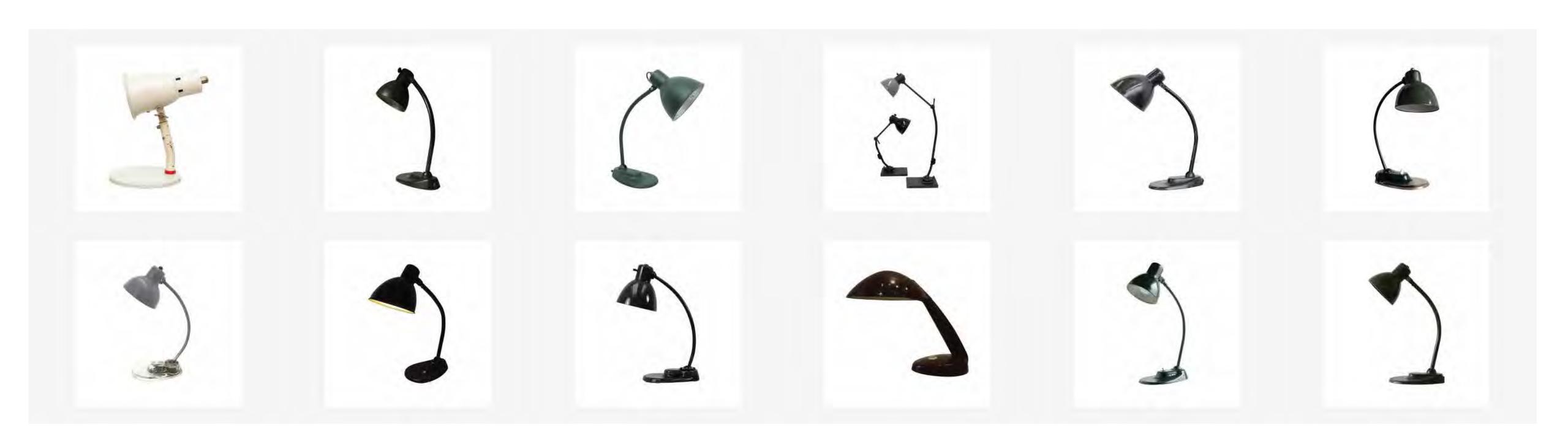


Brandt was proficient metalsmith in her design process and was the Director of the Bauhaus metal workshop from 1928-1929. Through her guidence, her students where able to ignite a easy-to-replicate components.



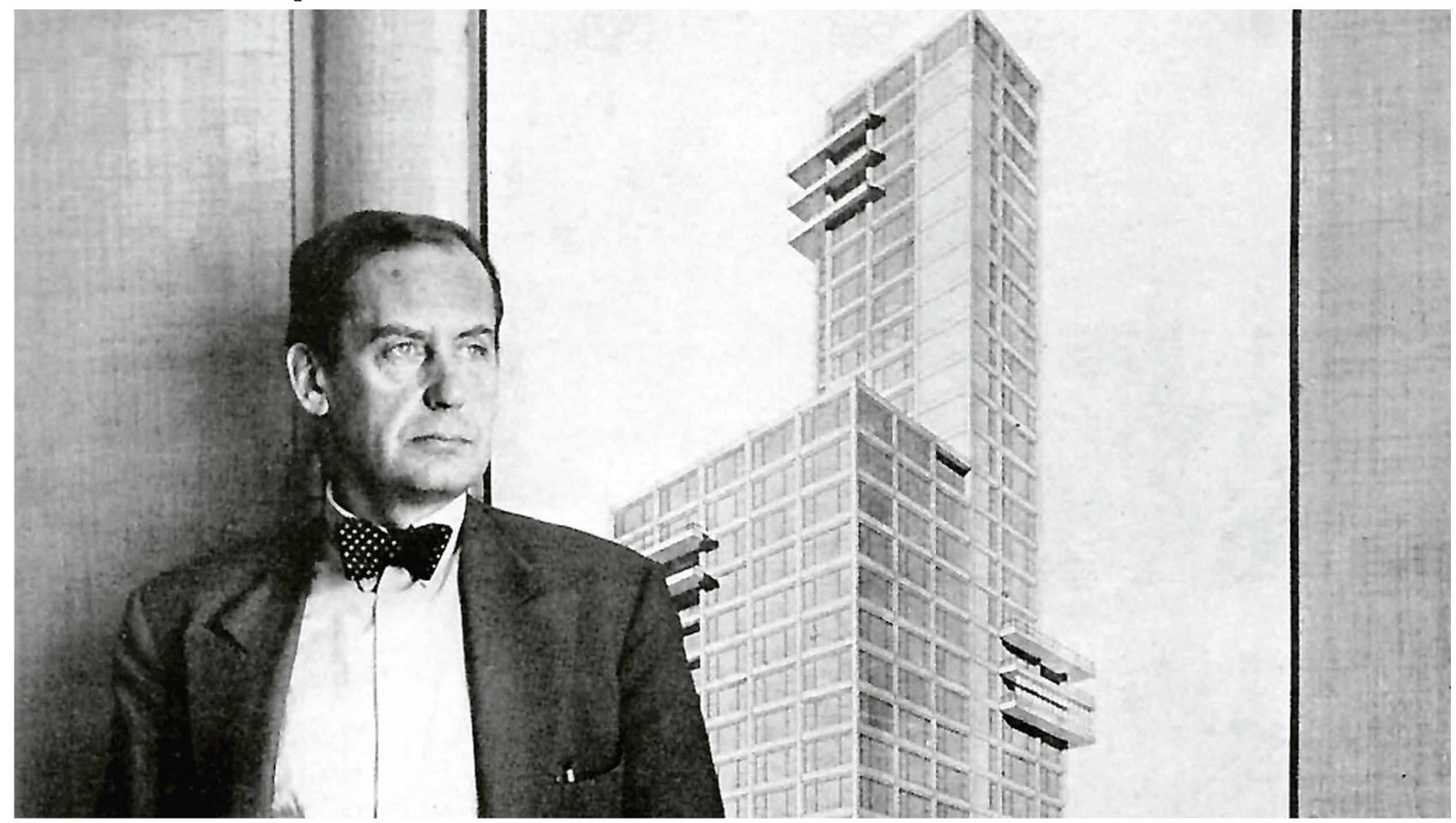
Brandt successfully designed a series of standardized lamps; it's simple design and form manufactured by Kandem were immediately commercialized.

### Körting & Mathiesen Kandem



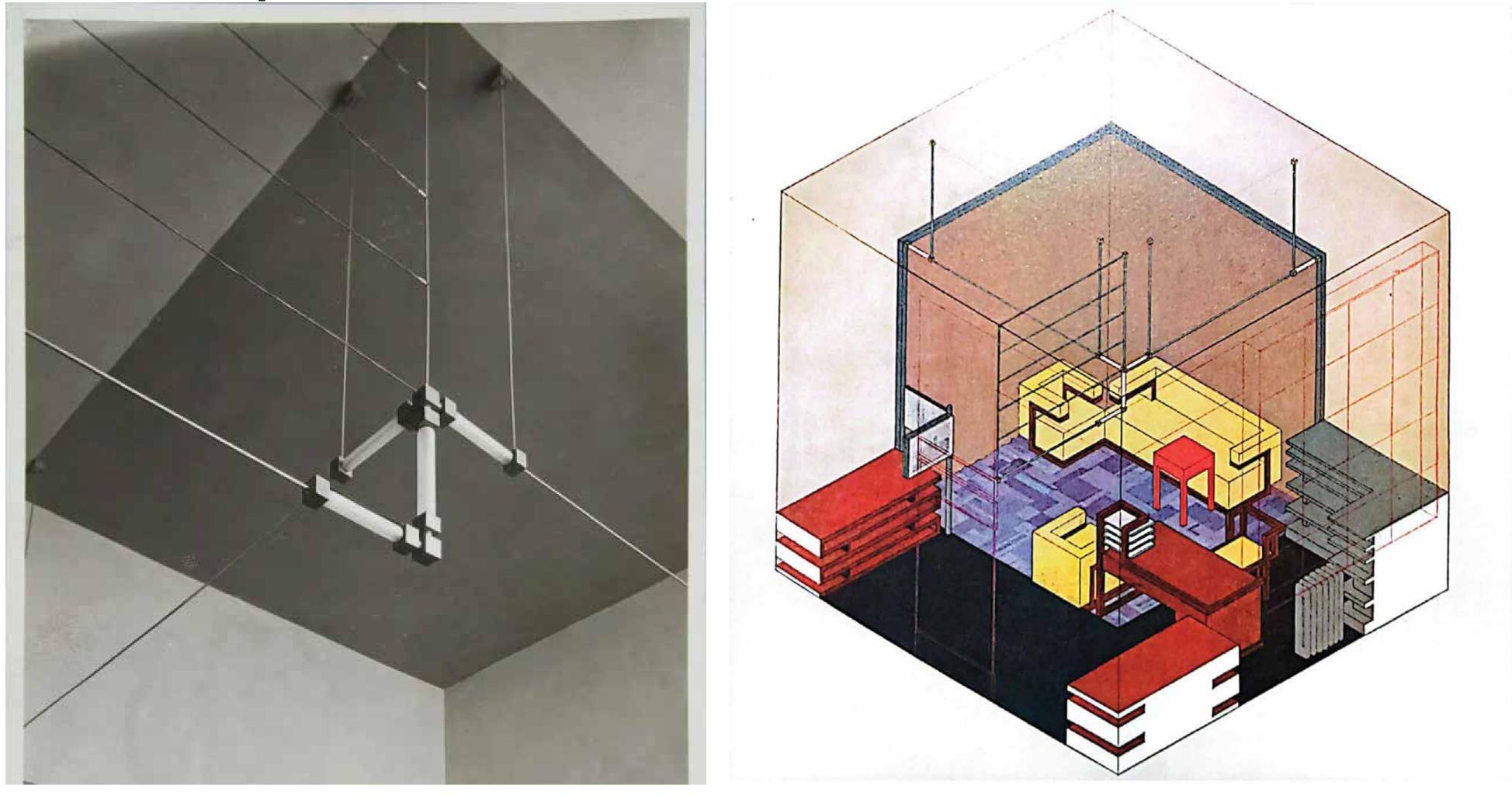
Brandt's expertise, Kandem could expand the production of their Lamps and explore the subtle difference in new lamp shapes and shades.

### **Walter Gropius**



Gropius was a German-American architect who founded the Bauhaus School. He was known as a pioneer of modern design. After the closing of the Bauhaus School, Gropius taught at Harvard University, where he left an impact on contemporary American Architecture.

**Walter Gropius** 



Designed by Gropius, this simple and clean lighting design, characterized by thin aluminum tubes.

Vignelli Mid Century Modernism

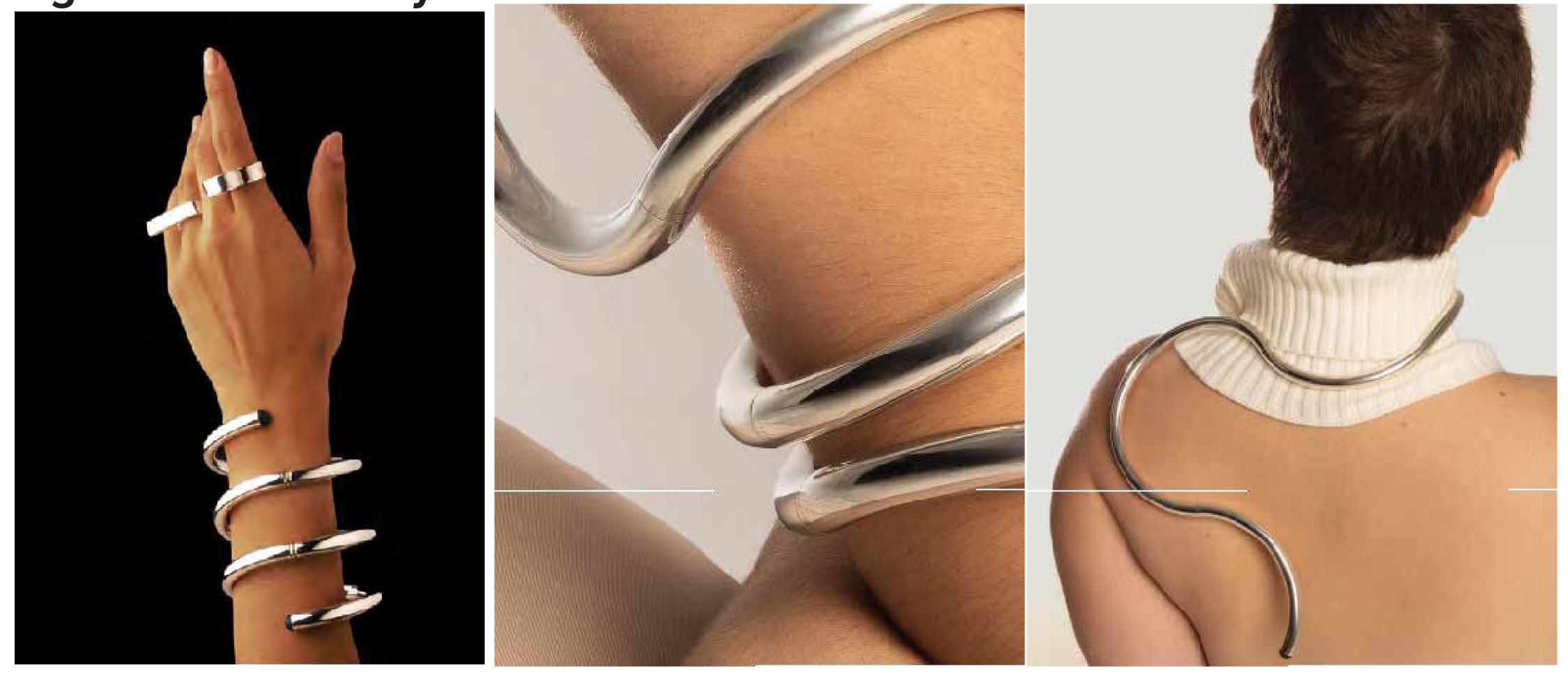


Vignelli believed that modern design should be simple and use basic shapes. The design process should be logical and objective and not driven by trends.

# Vignelli Mid Century Modernism

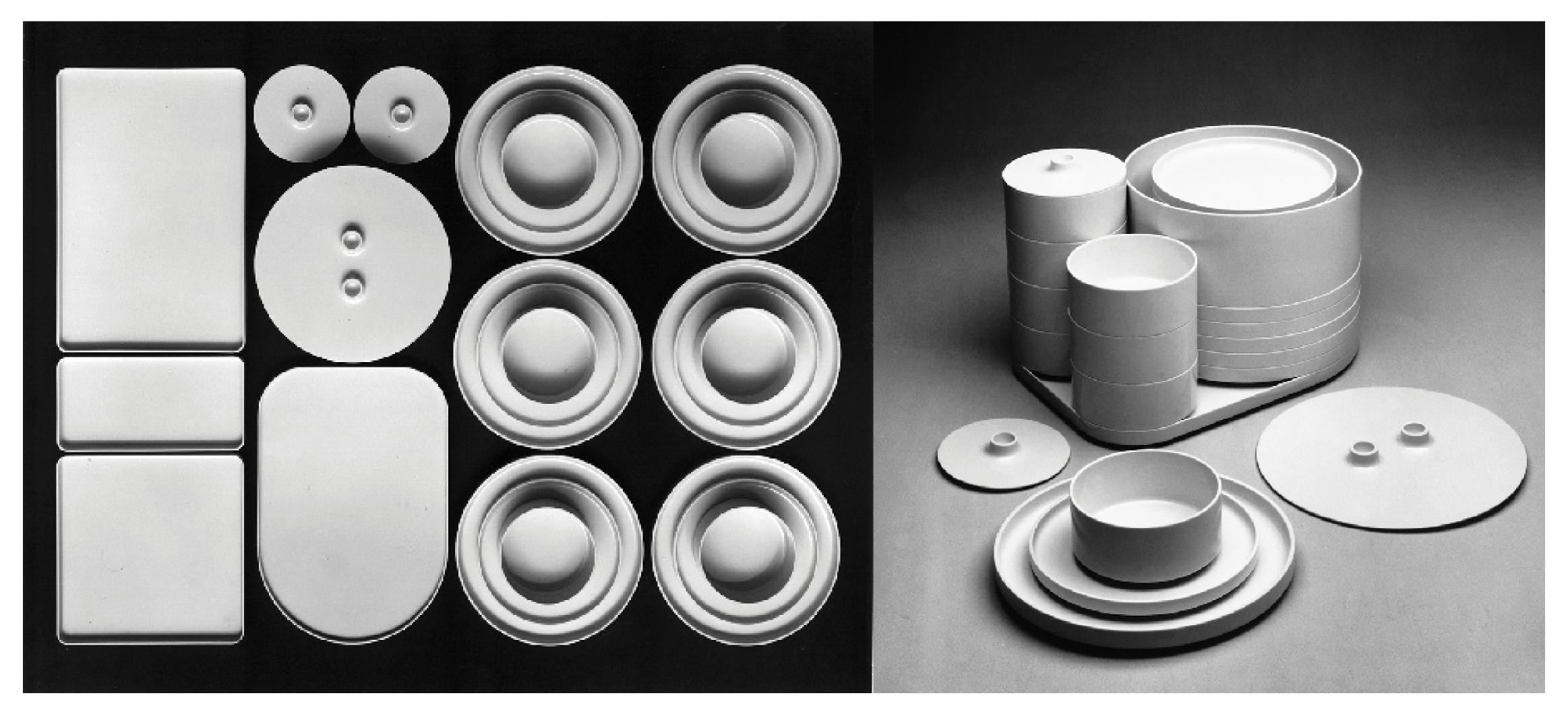
The Vignellis wanted to create designs that reflected cultural and ethical values and had a strong sense of integrity. Modernism was more than just a style - an attitude focused on designing valuable and meaningful things.

Vignelli Mid Century Modernism



The Vignellis wanted to create designs that reflected cultural and ethical values and had a strong sense of integrity. Modernism was more than just a style - an attitude focused on designing valuable and meaningful things.

### Case Study - Heller Dinnerware



Initially designed in Milan in 1964, the concept behind the dinnerware was to make a compact set of interlocking units that would save space and achieve a clean shape as a final result.

**Case Study - Heller Dinnerware** 



These cups were designed with conceived as a projection of the cup's walls. Both contain a "hole" at the top generated by their form. Another element that made this design unique was how the plate of the dishware accepted the curvature of the stable forms and was asymmetrical.

Case Study - Checho



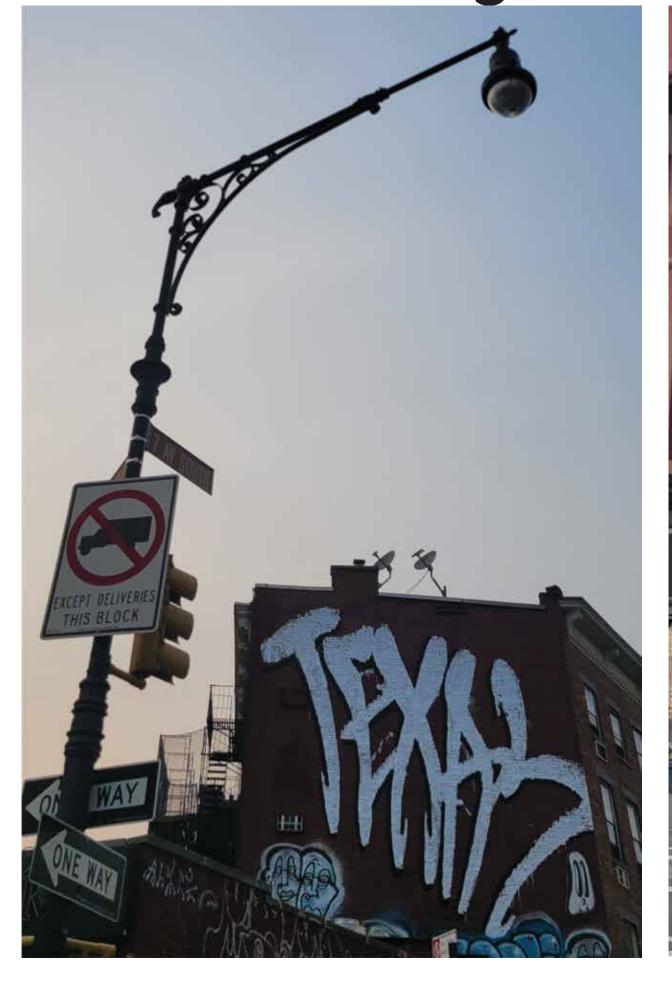
Voice-controlled Smart home hub that plays music, answers questions, sets lights and appliances, and performs many other tasks in and around the home. Similarly to Amazon Echo and Google Home, a simple "Oye Checho" will get the devices' attention. Having a helping hand around the home is common in Lanitx cultures.

Case Study - Checho



Smart hubs provide information, manage devices, and keep someone company. For many users, intelligent devices feel foreign, unfriendly, and intimidating. Checho's internal components include multiple microphones, high-fidelity speakers, and an Al system that manages other connected devices.

**Urban Street Lights of America** 

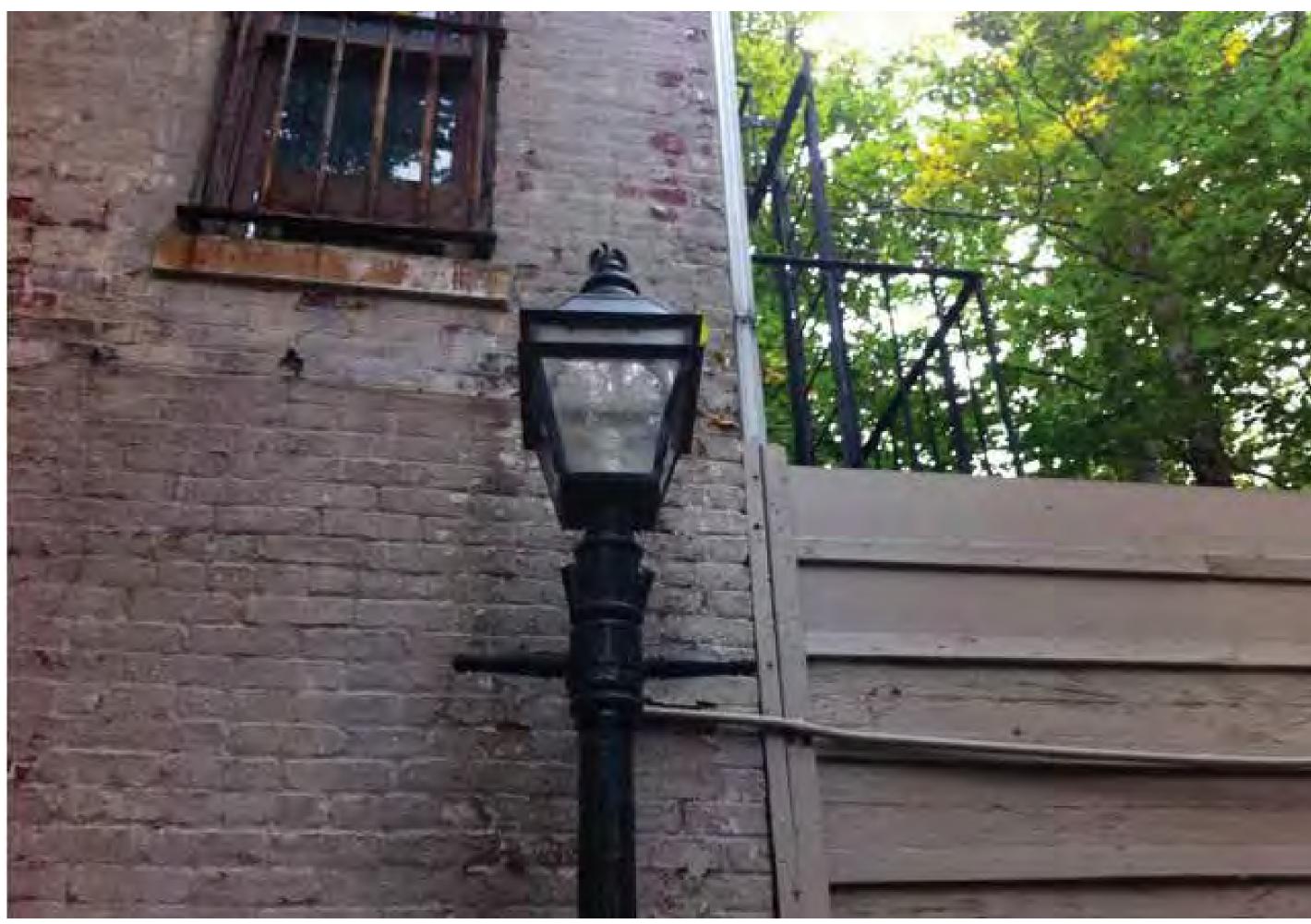




Long (Corp.)			

### Modern Urban Street Lights of America - Thomas Edison's Cast Iron Lamp post





Know as New York City's first "ornamental street lamps" Installed in September of 1892 - Located between 5th Avenue and Washington Square Park) Modern Urban Street Lights of America



LED, last for longer hour, reduces the cost of maintenance and energy consumption Shines light in a wider range of space.