

MIRA Unveils Connecticut's First Landfill-Based Solar Array 3,993 Photovoltaic Panels atop Capped Hartford Landfill

HARTFORD, Conn. – MIRA + Solar Array = Bright Future.

The [Materials Innovation and Recycling Authority](#) (MIRA) has built a 3,993-panel solar energy-generating facility on the closed Hartford landfill – the first of its kind in Connecticut and one of fewer than 100 nationwide.



From left, Mira President Thomas D. Kirk, DEEP Commissioner Robert Klee, Hartford Mayor Pedro Segarra, Mira Chairman Don Stein, Hartford Assistant Director Public Works Marilynn Cruz-Aponte and Hartford City Councilman Raul De Jesus, Jr.

Robert Klee. “We applaud the City of Hartford and MIRA for the vision they had to develop the first solar array on a closed landfill in Connecticut and for their overall commitment to be a clean energy leader.”

“The landfill, which for years was a sore subject for north-end residents, is now showing us the way to the future,” said Hartford Mayor Segarra. “Generating solar power is just the first of many innovative uses we’re planning for this land, projects that will benefit everyone in Hartford.”

At the MIRA facility, 3,993 photovoltaic panels will generate up to one megawatt of electricity, or enough electricity to power about 1,000 homes, when operating at full capacity. Weather and the sun’s position in the sky impact the amount of power solar cells generate.

MIRA showed off the facility at a grand-opening this morning at which MIRA Chairman Don Stein emphasized the importance of MIRA’s commitment to renewable energy. “We are proud of MIRA’s bringing this innovative renewable energy project to fruition,” said Stein, who is also First Selectman of Barkhamsted. “When we began capping the landfill seven years ago, we literally laid the groundwork for this facility. Today the landfill is safely, completely enclosed and we’re generating clean, renewable power.”

Hartford Mayor Pedro Segarra and [Department of Energy and Environmental Protection \(DEEP\)](#) Commissioner Robert Klee flipped a ceremonial switch acknowledging the official opening.

“Today marks a new era for the Hartford Landfill, transforming it into a real example of innovation and a forward thinking approach to energy and environmental issues,” said DEEP Commissioner

In 2012, [Connecticut Light & Power](#) selected the project to receive zero-emission renewable energy credits, or ZRECs. The ZRECs add 11 cents per kilowatt-hour to the price of electricity generated for sale by the solar collectors.

The solar facility was included in the final phase of capping the 96-acre landfill. [E. T. & L. Corporation](#) of Stow, Mass., received an \$11.6 million contract for the project, which installed a state-of-the-art synthetic cap over about 35 acres of the landfill. In 2014 MIRA completed capping the final 35 acres of the site.

Solar cells sit atop a layer of sand and a layer of [ClosureTurf™](#), an impermeable synthetic grass designed for covering landfills. [Tecta Solar, a national construction company with offices in](#) East Berlin, Connecticut installed the solar generators on 6 acres of the capped landfill for \$3.6 million of the \$11.6 million contract.

On Dec. 31, 2008, the landfill received its last deliveries of ash and bulky waste. The previous year, under a permit from DEEP, CRRA had begun installing a synthetic cap on portions of the landfill that had already reached capacity. The entire landfill is now covered with a thick synthetic membrane that encapsulates approximately 10 million tons of waste within the landfill to prevent infiltration by rainwater.

The entire project cost \$30 million, including the solar installation and last phase of capping. The capping project was paid for by a special reserve fund created by MIRA's predecessor, the Connecticut Resources Recovery Authority, and funded by the tipping fees paid by customers of the former CRRA Mid-Connecticut trash to energy system.

Though MIRA operates the landfill and owns and operates the solar generation system, the City of Hartford owns the site and is now considering possibilities for further development, including additional solar energy generation, greenhouses, or using the site as park land. The site offers panoramic views of the Hartford skyline, the surrounding hills and the Connecticut River.

To see how much power the facility is generating, visit [this public-view website](#).

The Materials Innovation and Recycling Authority (MIRA), the successor organization to CRRA, is a quasi-public agency whose mission is to work for – and in – the best interests of the participating municipalities of the State of Connecticut. MIRA's [board of directors](#) and [management team](#) develop and implement environmentally sound solutions and best practices for solid waste disposal and recycling management on behalf of municipalities. MIRA serves over 51 Connecticut municipalities, numerous businesses and commercial waste haulers. MIRA also operates [award-winning sustainability education](#) programs through the [MIRA Trash Museum](#) in Hartford. For more information about MIRA and its activities, visit <http://www.ctmira.org>.