DESRI Opposition Response Guide for Public Hearings

Health Concerns

Electromagnetic Fields (EMF)

Common Concern: "Solar farms increase emittance of electromagnetic fields (EMF), which poses serious health risks, especially to those with electromagnetic hypersensitivity."

DESRI Response: DESRI prioritizes community health and safety in all our projects. Multiple peer-reviewed studies have found no conclusive evidence of negative health impacts from EMF produced at solar farms. The electromagnetic fields at our solar facilities are:

- Similar in strength to common household appliances, such as toasters and refrigerators;
- No stronger than existing power infrastructure, since the solar facility interconnects into substations or transmission lines operating at equal or higher voltage;
- Well within international safety limits, typically measuring far below **2,000 milligauss (mG)**—the benchmark used by health and regulatory agencies;
- Non-ionizing, meaning the radiation lacks the energy to alter DNA or cause cellular damage;
- Rapidly dissipating with distance, dropping to background or undetectable levels within 150 feet of electrical equipment.

Sources: Cleveland, Tommy. "Health and Safety Impacts of Solar Photovoltaics." NC State University (May 2017); Massachusetts Department of Energy Resources et al., "Questions & Answers: Ground-Mounted Solar Photovoltaic Systems" (June 2015)

Heavy Metals and Toxicity

Common Concern: "Lead and cadmium in solar panels can leach into groundwater and affect plants."

DESRI Response: DESRI uses only high-quality solar panels that meet rigorous safety standards. Our panels are designed with multiple safeguards:

- All materials are encased in **tempered glass** designed to withstand extreme conditions; the internal components remain in solid state, and even if a panel breaks, **materials do not leak** into the surrounding environment;
- If cadmium is used, it exists in the form of **cadmium telluride (CdTe)**—a chemically stable compound with **1/100th the toxicity** of elemental cadmium; cadmium is **not used** in monocrystalline silicon modules, which are the most common in utility-scale projects;

- The **Massachusetts Department of Energy Resources** found **"little, if any, risk of chemical releases during normal use"** of solar panels;
- **Peer-reviewed studies** confirm no elevated levels of lead or cadmium in soils near long-standing solar facilities;
- Even in worst-case scenarios—such as fires or natural disasters—**over 99.9% of panel materials remain encapsulated** and do not leach into the ground.

Sources: NC Clean Energy Technology Center, "Health and Safety Impacts of Solar Photovoltaics" (2017); Robinson et al., "Potential for leaching of heavy metals and metalloids from crystalline silicon photovoltaic systems," Journal of Natural Resources and Development (2019); Matsuno, "Environmental risk assessment of CdTe PV systems under catastrophic events in Japan," First Solar (2013)

Environmental Impact

Carbon Footprint and Climate Benefits

Common Concern: "Solar farms make climate change worse and require more energy to build than they produce."

DESRI Response: DESRI's solar projects deliver substantial climate benefits throughout their 40-year operational life:

- Solar panels offset their manufacturing emissions within just **3 years**;
- Lifecycle emissions are **43 g CO_2/kWh**, compared to **1,001 g** for coal and **486 g** for natural gas;
- Each acre of solar panels reduces **175–198 metric tons of CO_2 annually**;
- Utility-scale PV uses a median **~26 gallons/MWh** (primarily for periodic panel washing), versus **~198 gallons/MWh** for gas combined-cycle and **~687 gallons/MWh** for coal plants with cooling towers — representing a **70–95% reduction in operational water use**;
- Our projects help communities meet climate goals while delivering **clean, reliable, and affordable energy**.

Sources: National Renewable Energy Laboratory, *Life Cycle Greenhouse Gas Emissions from Electricity Generation: Update* (2021); Schlömer et al., *Climate Change 2014: Mitigation of Climate Change*, IPCC (2014); Bolinger & Bolinger, *Land Requirements for Utility-Scale PV*, IEEE Journal of Photovoltaics (2022); Macknick et al., *Operational Water Consumption and Withdrawal Factors for Electricity Generating Technologies: A Review*, Environmental Research Letters (2012)

Soil Pollution

Common Concern (1): "Solar development creates an ecological wasteland."

DESRI Response: DESRI is committed to environmental stewardship and implements best practices to protect and enhance biodiversity:

- We conduct thorough environmental assessments prior to development and avoid or mitigate impacts to critical habitats and species of concern;
- Our projects incorporate **pollinator-friendly habitats and native plantings** to support local ecosystems and restore degraded lands;
- We minimize soil disturbance where possible and **reseal disturbed areas with native seed mixes** after construction is complete;
- We often install **wildlife-friendly game fencing** with larger openings than chain-link alternatives, allowing small animals to pass through while keeping large game out;
- Many DESRI sites experience **increased botanical diversity and pollinator populations** over time due to reduced pesticide use and naturalized vegetation;
- Construction activities are **scheduled to avoid sensitive breeding or migration periods**, reducing disruption to local wildlife.

Sources: Sinha et al., "Best Practices in Responsible Land Use for Improving Biodiversity at a Utility-Scale Solar Facility," Case Studies in the Environment (2018); Walston et al., "If you build it, will they come? Insect community responses to habitat establishment at solar energy facilities," Environmental Research Letters (2024); The Biodiversity Consultancy, "Mitigating biodiversity impacts associated with solar and wind energy development," IUCN (2021)

Biodiversity and Wildlife

Common Concern (2): "What about the burrowing owls/eagles/local wildlife?"

DESRI Response: DESRI conducts thorough environmental assessments and implements protective measures:

- Pre-construction **biological surveys** identify the presence of sensitive or protected species before any ground is disturbed;
- We consult closely with **state and federal wildlife agencies** (e.g., USFWS, state departments of natural resources) to develop and implement species-specific protection plans;
- **Wildlife corridors** are incorporated where required to ensure habitat connectivity across the landscape;
- Many sites experience **increased biodiversity** due to the elimination of pesticide use and the introduction of **pollinator-friendly ground cover;**
- We comply fully with federal regulations, including **Section 404 permits** for wetlands when applicable;
- **Game fencing** is commonly used to protect infrastructure while still allowing **small mammals and reptiles** to move through the site unharmed.

Sources: U.S. Fish and Wildlife Service guidelines; State wildlife agency protocols; The Biodiversity Consultancy, "Mitigating biodiversity impacts associated with solar and wind energy development" (2021)

Tree Clearing

Common Concern: "Cutting down trees for solar negates climate benefits."

DESRI Response: When siting is necessary on forested land, DESRI carefully evaluates the carbon impact:

- Each acre of utility-scale solar **prevents approximately 204–231 times more CO_2 annually** than an acre of average U.S. forest can absorb—because solar replaces electricity that would otherwise come from fossil fuels like coal or natural gas;
- **Carbon released from tree removal is typically offset within two years** of solar operations;
- Only **~4% of U.S. solar projects are sited on currently forested lands**;
- DESRI **prioritizes previously disturbed or low-value lands** and works to minimize any necessary tree clearing;
- Where clearing is required, we **harvest and reuse timber** where feasible, reducing waste and maximizing resource value;
- Installing solar in wooded areas can **help reduce pressure on farmland**, creating a land-use balance across regions where energy demand intersects with forested terrain.

Sources: EPA Greenhouse Gas Equivalencies Calculator; Kruitwagen et al., "A Global Inventory of Photovoltaic Solar Energy Generating Units," Nature (2021); Bolinger & Bolinger, IEEE Journal of Photovoltaics (2022)

Agricultural and Rural Community Impact

Farmland Preservation

Common Concern: "Solar projects will reduce agricultural production and hurt farmers."

DESRI Response: DESRI partners with farmers to provide economic benefits while preserving agricultural heritage:

- Lease payments provide stable income that helps farmers weather market volatility;
- Even under maximum buildout scenarios, utility-scale solar would use only **1.15% of U.S. farmland**—a figure based on DOE's high-decarbonization pathway in which solar supplies nearly half of U.S. electricity by 2050. Most solar is sited on **lower-value or marginal land**, not prime cropland;
- During early development, farmers can typically continue using **95% or more** of leased land for farming or grazing. Once operational, most of the land remains uncovered by panels and is often planted with grass or other vegetation that **restores soil health**, making previously degraded land **farmable again by the time the project is decommissioned**;
- We support **agrivoltaics** where appropriate, including **grazing livestock**—typically sheep, and in some cases, cattle—beneath and around solar panels;
- **Solar requires 63–197 times less land than corn ethanol** to produce the same amount of energy, making it one of the most **land-efficient clean energy sources** available.

Sources: U.S. Department of Energy, "Solar Futures Study" (2021); U.S. Department of Agriculture, "Farms and Land in Farms: 2021 Summary" (2022); Mathewson & Bosch, "Corn Ethanol vs. Solar: Land Use Comparison," Clean Wisconsin (2023); Mills, "Wind Energy and Rural Community Sustainability," Handbook of Sustainability & Social Science Research (2018)

Rural Economic Benefits

Common Concern: "Solar projects harm rural communities economically."

DESRI Response: DESRI projects strengthen rural economies through:

- Direct **lease payments to landowners** provide drought-resistant, multi-decade income;
- **Significant property tax revenue** supports schools, roads, emergency services, and other local needs;
- Projects create **local construction and long-term maintenance jobs**, boosting employment opportunities;
- Construction phases bring **increased spending in local businesses**, including restaurants, lodging, fuel suppliers, and hardware stores;
- **No burden on municipal services**—projects do not require water, sewer, or school infrastructure;
- Many farmers report **greater confidence in farm succession planning**, knowing solar lease income supports multigenerational farming.

Sources: Mills, "Wind Energy and Rural Community Sustainability" (2018); National Renewable Energy Laboratory, "Agrivoltaics" resources; Dinesh & Pearce, "The potential of agrivoltaic systems," Renewable and Sustainable Energy Reviews (2016)

Property Values

Common Concern: "Solar farms destroy the value of nearby homes."

- **DESRI Response:** DESRI understands property value concerns and works to be a good neighbor:DESRI works to limit siting near residences wherever possible;
- Comprehensive studies analyzing **1.8 million home sales** across six states show **minimal impact** on property values;
- Homes located **more than 1 mile away** typically experience **no measurable price effect**, according to peer-reviewed research published in the *Review of Economics and Statistics*;
- For homes **within 0.5 miles**, the same study found average impacts of just **1–2%**, which is **far lower** than public perception;
- By contrast, **fossil fuel plants reduce nearby property values by 4–7%** within a 2-mile radius;
- DESRI implements **setbacks and vegetative buffers** to reduce visibility and preserve rural character;
- **Property tax revenue generated by solar projects benefits the entire community**, including homeowners, schools, and public services.

Sources: Elmallah et al., "Shedding Light on Large-Scale Solar Impacts," Energy Policy (2023); Gaur et al., "Property Value Impacts of Commercial-Scale Solar Energy in Massachusetts and Rhode Island," University of Rhode Island (2020); Davis, "The Effect of Power Plants on Local Housing Value and Rents," Review of Economics and Statistics (2011)

Additional Property Value Considerations

Common Concern: "Property values will depreciate over time due to solar development."

DESRI Response: Long-term studies provide reassuring data about property values near solar facilities:

- **Multiple studies show neutral or even positive effects** on nearby home values, especially when solar is well-sited and includes screening;
- A **2023 study in Indiana and Illinois** found that properties near solar appreciated slightly likely due to **infrastructure upgrades and farmland preservation** that made nearby areas more desirable;
- **We follow best practices to minimize visual impact** and engage with neighbors early, including offering setbacks and vegetative buffers when needed;
- **Property tax revenue from solar supports local improvements** like schools, roads, and public safety, benefiting all property owners;
- **Unlike industrial or fossil fuel facilities**, solar farms generate **no pollution, odor, or traffic**, making them low-impact neighbors over the long term.

Sources: Guo et al., "The visual effect of wind turbines on property values is small and diminishing in space and time," PNAS (2024); McGarr & Lines, "Property Value Impact Study: Proposed Solar Farm," McLean County, IL (2018); Al-Hamoodah et al., Lawrence Berkeley National Laboratory (2018)

Economic Viability

Cost and Subsidies

Common Concern: "Solar depends entirely on subsidies and increases electricity costs."

DESRI Response: DESRI develops economically sustainable projects that benefit ratepayers:

- Solar is now the most affordable source of electricity in most U.S. regions. In recent market comparisons, unsubsidized solar averages $60/MWh, compared to $117/MWh for coal—even without accounting for public health and climate costs.
- Utility-scale solar costs have declined by more than 90% since 2011, driven by improvements in panel efficiency, scale, siting, and financing. Today, solar is often cheaper than maintaining aging fossil fuel plants, especially coal and peaker gas units.
- Solar provides long-term price stability, unlike fossil fuels, which are subject to global commodity markets, geopolitical tension, and volatile fuel costs. Once built, a solar project locks in predictable pricing for 30–40 years with no ongoing fuel purchases.

- Federal incentives for solar are modest compared to historical fossil fuel subsidies. The latest clean energy package—the One Big Beautiful Bill, passed under President Trump in July 2025—phases out solar tax incentives by 2030 and battery incentives by 2035, ensuring a level playing field across technologies.
- Our projects create local jobs and bring value to the local economy through new revenue for counties and school districts via property taxes, voluntary contributions to local infrastructure, emergency services, and workforce training, and more.

Sources: Lazard, "Levelized Cost of Energy Analysis: Version 16.0" (April 2023); International Energy Agency, "World Energy Outlook 2020" (2020); U.S. Energy Information Administration, "Federal Financial Interventions and Subsidies in Energy" (2023)

Energy Independence and Security

Common Concern: "Oil/fossil fuels are more reliable - what happens when we run out of materials for solar?"

DESRI Response: Solar energy provides true energy independence and long-term security:

- The sun provides more energy in one hour than the entire world consumes in a year, making solar one of the most abundant and reliable energy sources on Earth.
- Solar panels last 30–40 years with minimal efficiency loss (typically <0.5% per year), providing decades of clean power with no fuel input.
- Material scarcity is not a limiting factor. The most common solar technologies rely on abundant elements like silicon, aluminum, and glass. Metals like silver are used in small amounts and can be recycled; emerging technologies are further reducing critical material intensity.
- Domestic solar manufacturing is scaling rapidly, supported by federal incentives and private investment—reducing dependence on foreign supply chains and building energy resilience at home.
- Once installed, solar generates electricity at no fuel cost, with no price spikes, no supply disruptions, and no geopolitical risk.
- Distributed solar reduces vulnerability to large-scale outages, since energy is produced at many locations across the grid instead of being centralized.
- Unlike fossil fuels, which are finite and increasingly expensive to extract, solar energy is renewable and inexhaustible—it cannot be depleted, and its inputs (sunlight and common materials) are secure.

Sources: International Energy Agency, "Solar PV Global Supply Chains" (2022); NREL, "Solar Resource Data"; U.S. Department of Energy, "Solar Futures Study" (2021)

Oil Dependence vs. Solar Independence

Common Concern: "We should stick with oil - at least we know where it comes from."

DESRI Response: Solar offers superior energy security compared to fossil fuels—including coal, oil, and natural gas:

- **Coal remains one of the most carbon-intensive and supply-challenged fuels** in the U.S., with many plants relying on long-distance rail shipments that are increasingly costly and vulnerable to disruption;
- **Aging coal infrastructure is being retired** due to maintenance costs, regulatory pressure, and uncompetitive economics—leaving communities at risk of stranded assets and energy shortfalls;
- **Unlike coal or gas, solar requires no fuel extraction, shipping, or storage**—just sunshine, which is domestic, abundant, and free;
- The U.S. **still imports millions of barrels of oil daily**, exposing our economy to global price shocks and geopolitical risk;
- **Oil and gas price volatility** has repeatedly harmed U.S. households, spiked inflation, and strained industrial supply chains;
- **Solar installations are permanent domestic energy assets** that can operate for 30–40 years with minimal maintenance;
- **No ongoing fuel purchases or international supply chains are needed**, reducing both cost risk and exposure to foreign markets;
- **Solar prices have declined over 80% since 2010**, while fossil fuel prices remain volatile and subject to market speculation;
- **Local solar generation reduces transmission losses**, lowers peak demand stress on the grid, and strengthens local reliability;
- **Communities with solar are more resilient** during energy crises and extreme weather, especially when paired with storage;
- **Tax revenue from solar stays local**, helping counties fund schools, roads, and emergency services—unlike oil and gas profits, which often flow out of state or overseas;
- **The solar workforce creates permanent, local jobs** in construction, operations, and maintenance—none of which can be offshored.

Sources: Energy Information Administration import/export data; Department of Energy "Benefits of Renewable Energy Use"; International Renewable Energy Agency (IRENA) reports on energy security

Reliability

Common Concern: "Solar is unreliable and requires 100% fossil fuel backup."

DESRI Response: DESRI projects contribute to grid reliability through modern technology:

- **Solar + storage systems deliver firm, dispatchable electricity during peak demand hours**, often when grid strain is highest.
- **Geographic diversity of solar projects ensures consistent, resilient generation** across weather and load conditions.
- **Grid operators are successfully integrating high levels of solar**—California, for example, has achieved periods powered entirely by renewables.

- **Battery storage is advancing quickly**, becoming ever more affordable and enhancing grid flexibility.
- **Modern grid management tools**, like automated demand response and smart inverters, optimize renewable integration and reliability.
- **During an early summer heat wave in May 2025**, solar provided **up to 40% of daytime power** on the ERCOT grid, helping Texas avoid rolling blackouts even as temperatures soared. This was bolstered by more than 11 GW of battery storage supporting evening demand.

Sources: U.S. Department of Energy, "Solar Futures Study" (2021); Princeton University, "Net-Zero America" study (2021); California Energy Commission data (2022); E&E News, "Solar Power Bails Out Texas Grid During Major Heat Wave" (2023)

Waste and Recycling

Common Concern: "Solar panels will overwhelm landfills with toxic waste."

DESRI Response: DESRI is committed to responsible lifecycle management:

- Solar panels are sealed units and **do not release chemicals** under normal use—even when damaged, materials stay encapsulated;
- Solar panel waste is 300–800× lower by mass than coal ash. Solar's minimal material footprint translates into far less hazardous byproduct disposal compared to fossil fuels;
- Roughly 85–95% of panel materials—glass, aluminum, copper, silicon—are recyclable;
- Panels last 30–40 years with minimal degradation, often maintaining high efficiency even through decades of exposure;
- We partner with certified recyclers to ensure responsible end-of-life management. This includes arrangements where decommissioned facilities recover metals like aluminum, copper, and steel;
- Valuable materials are recaptured for new panel production, reducing dependency on virgin mining and strengthening domestic supply chains;
- Facilities salvage scrap metals and components, promoting reuse and closing the materials loop in a durable, circular energy economy.

Sources: Mirletz et al., "Unfounded concerns about photovoltaic module toxicity and waste are slowing decarbonization," Nature Physics (2023); Heath, "Research and Development Priorities for Silicon Photovoltaic Module Recycling," Nature Energy (2020); U.S. Department of Energy, "Photovoltaics End-of-Life Action Plan" (2022)

Land Use

Common Concern: "Solar uses too much land that could be used for other purposes."

DESRI Response: DESRI practices responsible land stewardship:

- Solar uses ~5,190 acres per TWh vs. 395,000 for biomass energy vs. 1 million+ acres for corn ethanol;
- Dual-use opportunities include grazing, pollinator habitat, and some crops;
- Minimal physical land impact since most of the property underneath the panels is vegetated;
- Temporary use - land can be fully restored after project life.

Sources: Lovering et al., "Land-use intensity of electricity production," PLOS One (2022); U.S. Global Change Research Program, "Fifth National Climate Assessment" (2023); McGill University research on land efficiency (2024)

Visual Impact and Noise

Common Concern: "Solar farms are eyesores and create noise pollution."

DESRI Response: DESRI designs projects to minimize community impacts:

- Community input is a high priority for DESRI and is strongly considered during project design;
- Solar facilities generate minimal noise during operation, which dissipates with distance;
- Inverter and battery noise is minimal and comparable to residential air conditioners;
- If needed, we can implement landscaping and visual buffers;
- Setbacks ensure appropriate distance from residences. DESRI typically sets back 500ft from residences;
- Low profile installations (typically under 15 feet, aside from transmission line and substation)
- Anti-reflective coatings minimize glare.

Sources: Massachusetts Clean Energy Center, "Study of Acoustic and EMF Levels from Solar Photovoltaic Projects" (2012); Various state and local noise ordinances

Temperature and Heat Island Effects

Common Concern: "Solar panels make the area hotter - it's 5 degrees warmer near solar farms."

DESRI Response: DESRI understands concerns about local temperature impacts. Scientific research shows:

- **Solar panels convert sunlight into electricity, not heat**, unlike dark asphalt or bare soil that absorbs and radiates heat directly;
- **Stanford researchers found solar PV has *negative* heat emissions** (–2.2 g CO_2e/kWh), meaning panels reduce net surface heating by limiting solar energy absorption by the ground;

- **Panels shade the soil**, reducing ground-level temperatures and often creating **cooler microclimates** that support native plants, pollinators, and grazing;
- **Unlike fossil fuel plants**, which release enormous amounts of waste heat into the air and water, **solar has no combustion and no thermal discharge**.

Sources: Jacobson, M.Z., "Evaluation of Nuclear Power as a Proposed Solution to Global Warming," Stanford University (2019); Kadam et al., "Solar Panel Heat Emission and Its Environmental Impact," International Journal of Advanced Research in Science (2022); Suuronen et al., "Influence of Solar Power Plants on Microclimatic Conditions," Environmental Management (2017)

Decommissioning

Common Concern: "What happens when the solar farm is abandoned?"

DESRI Response: DESRI ensures responsible project closure:

- **Decommissioning bonds or financial assurances** are typically held by the **county or landowner**, guaranteeing funds are available to fully restore the site at the end of the project's life;
- **Detailed decommissioning plans** are often filed with local authorities **before construction**, outlining how equipment will be removed and the land returned to its prior use;
- **All above-ground infrastructure is removed**, and the land is **restored to pre-project conditions**—no long-term contamination, waste ponds, or brownfields like those left by fossil fuel sites;
- **Most materials are recycled or reused**, including steel, aluminum, copper, and solar panel components. DESRI partners with **certified recyclers** and salvage vendors to responsibly manage end-of-life materials;
- **Landowner protections are built into lease agreements**, specifying site restoration terms, timelines, and responsibilities to ensure their land is returned in a usable, productive state;
- **DESRI has a strong track record of responsible project management**, from siting and construction through decommissioning—honoring its commitments to both communities and landowners.

Sources: Industry best practices; State renewable energy regulations; Solar Energy Industries Association guidelines

Battery Energy Storage Systems (BESS) Safety

Fire Safety Concerns

Common Concern: "Aren't these battery systems dangerous? I saw in the news that [INSERT PROJECT] caught on fire."

DESRI Response: DESRI takes battery safety extremely seriously and uses the most advanced safety technology:

- We use lithium iron phosphate (LFP) chemistry, which is inherently more stable and less flammable than older lithium-ion types used in phones, e-bikes, or scooters;
- Our systems meet the most rigorous fire testing standard, UL 9540A, and are built under national fire codes including NFPA and the International Fire Code;
- Modern BESS designs include multiple layers of fire protection, such as thermal sensors, automatic fire suppression, physical compartmentalization, 24/7 monitoring and remote shutoff capability;
- Failure rates have dropped 98% since 2018. Nearly all recent incidents involved outdated chemistries or early system designs—not today's advanced equipment;
- We proactively coordinate with local fire departments to provide emergency response plans (ERPs), training sessions, and hands-on drills well before commissioning;
- Smoke from a BESS fire is comparable to a structure fire, and safety protocols ensure events are localized and contained, not cascading through multiple units;
- Our fire safety consultant (ESRG) helps train first responders, develop ERPs, and provides expert testimony in public settings.

Sources: UL 9540A Test Method for Evaluating Thermal Runaway Fire Propagation; NFPA 855 Standard for the Installation of Stationary Energy Storage Systems; DNV GL Battery Safety Report

Emergency Response

Common Concern: "Fire departments aren't ready for this kind of hazard."

DESRI Response: DESRI partners closely with local emergency responders:

- **We engage local fire departments early in the development process, well before construction begins;**
- **Every project includes a comprehensive Emergency Response Plan (ERP), developed in coordination with local officials and delivered before the system goes live;**
- **We provide customized, hands-on training for first responders, led by industry-recognized experts like ESRG, focused on lithium iron phosphate (LFP) battery behavior, site access, and fire suppression protocols;**
- **First responders receive detailed safety materials, including site-specific layouts and hazard zones, Material Safety Data Sheets (MSDS), 24/7 emergency contacts and remote shutdown instructions;**
- **DESRI funds additional equipment or training as needed, ensuring departments have what they need to respond confidently and effectively;**
- **Modern BESS systems are engineered to isolate thermal events, and fire departments across the U.S. have successfully managed the rare incidents that do occur using established protocols;**

- **Key takeaway: We don't wait until there's a problem—we prepare local responders upfront, building confidence through training, information sharing, and ongoing partnership.**

Sources: NFPA 855; International Association of Fire Chiefs BESS Guidelines; Local fire department coordination protocols

Explosion and Evacuation Risks

Common Concern: "These batteries will explode like scooters and e-bikes do!" / "We'll need to evacuate the whole town if there's a fire!"

DESRI Response: DESRI's utility-scale systems are fundamentally different from consumer devices:

- LFP chemistry is much more stable and less flammable than batteries in personal electronics;
- Industrial BESS use sophisticated battery management systems to prevent overcharge and overdischarge;
- Systems are designed with thermal barriers to prevent thermal runaway from spreading between modules;
- Fire suppression systems are integrated and activate automatically if a fault is detected;
- Evacuation zones, when needed, are typically limited to the immediate project site;
- Smoke from BESS fires is similar to that of ordinary structure fires—not uniquely toxic or more dangerous;
- Containerized designs isolate potential faults and prevent chain reactions across the system.

Sources: FM Global Property Loss Prevention Data Sheets; UL 9540A test results; EPRI Battery Storage Fire Safety Roadmap

Community Engagement and Trust

Early Involvement

Common Concern: "Developers make decisions without community input." / "We're only hearing about this after decisions are made."

DESRI Response: DESRI is committed to meaningful community engagement:

- We initiate outreach early in the development process, often before formal applications are submitted, via open houses and attendance at local events
- We consider community feedback in project design, including setbacks, screening, and layout
- We host multiple public meetings, even if it's not required under local County/municipal code. At these meetings, we provide contact information to project leads so that meeting attendees can reach out with follow up questions and concerns about the projectPrioritization of local hiring

- We meet with local stakeholders (fire departments, schools, county officials, etc.) to understand community needs and provide community benefit programs and/or donations to give back to host communities
- Project websites provide transparent, updated information throughout development

Economic Benefits and Local Value

Common Concern: "Outsiders profit while we get stuck with the impacts." / "How does this benefit our community?"

DESRI Response: DESRI projects deliver substantial local benefits:

- We initiate outreach early in the development process—often **before formal applications are submitted**—through open houses, local events, and informational outreaches;
- We incorporate community feedback into project design, including **setbacks, vegetative screening, traffic planning, and layout adjustments;**
- We host **multiple public meetings**, even when not required under County or municipal code; and provide **direct contact information** for project leads to ensure ongoing communication and accountability;
- We meet with key local stakeholders—including **fire departments, schools, and county officials**—to understand community needs and identify **benefit programs or donations** that give back to the host community;
- We prioritize **local hiring and procurement** to ensure nearby residents and businesses benefit from our presence;
- Project websites provide **transparent, regularly updated information** throughout development and construction to keep the public informed.