

Ethical dilemmas in community solar

Community Energy England Conference
18 September 2023, London

Ethical warmup

We should aim to install solar panels on any building irrespective of its use.

We shouldn't use a volunteer to do a job that somebody could be paid for.

We shouldn't cancel our solar project even if we can't get ethically-sourced panels.

Our ethical dilemmas

Where to put solar.

- Significant points of difference across team
- Individuals can opt to not work on projects they disagree with
- Probably will settle on an exclude list
- Using bank policy as a start point

Our ethical dilemmas

Using volunteers

- We are volunteer-owned
- We will use volunteers wherever we can and for as many tasks as possible
- We seek to create paid jobs and to use them to expand our reach
- Paid workers are there to help volunteers achieve their aims

Our ethical dilemmas

Turf wars

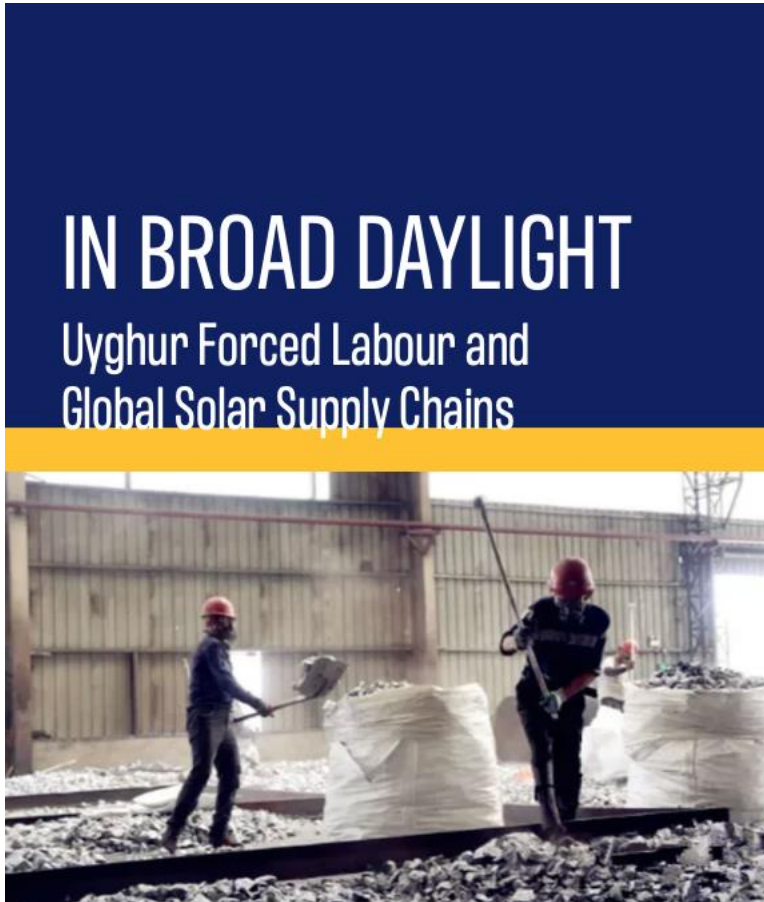
- We've ended up unwittingly competing with 2 others for one project!
- There is enough to go around
- Not all groups have capacity to cover their area
- Our structure enables groups to retain identity and work with us

Our ethical dilemmas

Panel sourcing

5 things we have learnt

1. It's a human rights issue



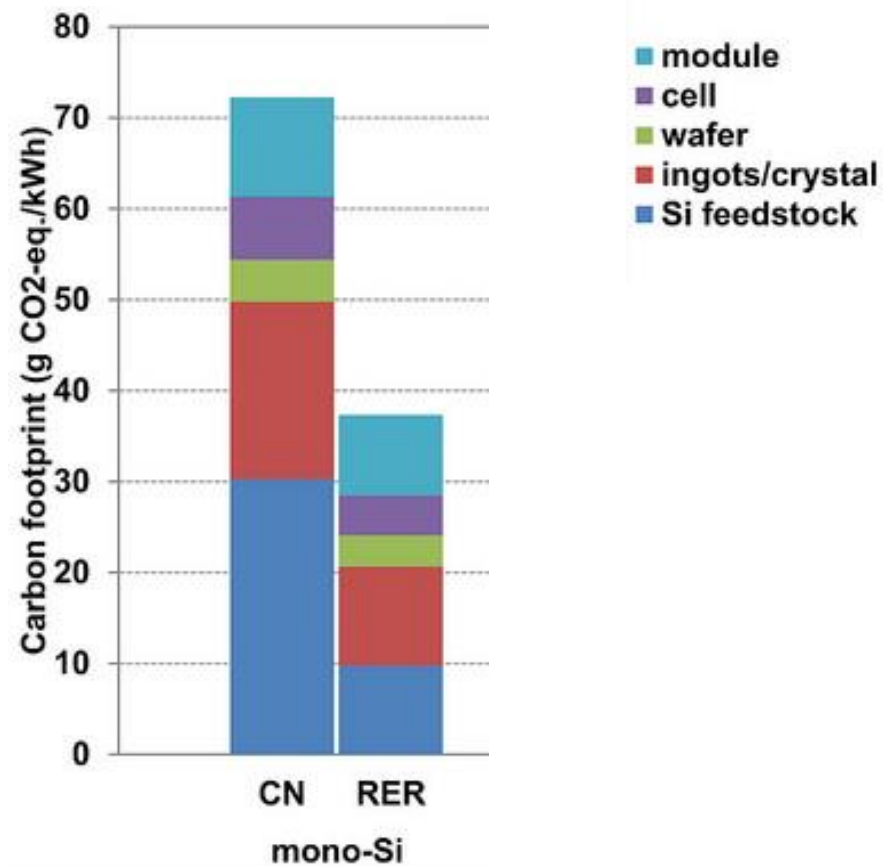
LAURA T. MURPHY & NYROLA ELIMÄ

Sheffield Hallam University
Helena Kennedy
Centre for
International Justice

“many of the major Chinese producers of raw materials, solar-grade polysilicon, ingots and wafers ... are operating facilities in the Uyghur Region that have employed forced labour transfers of the indigenous people of the region”

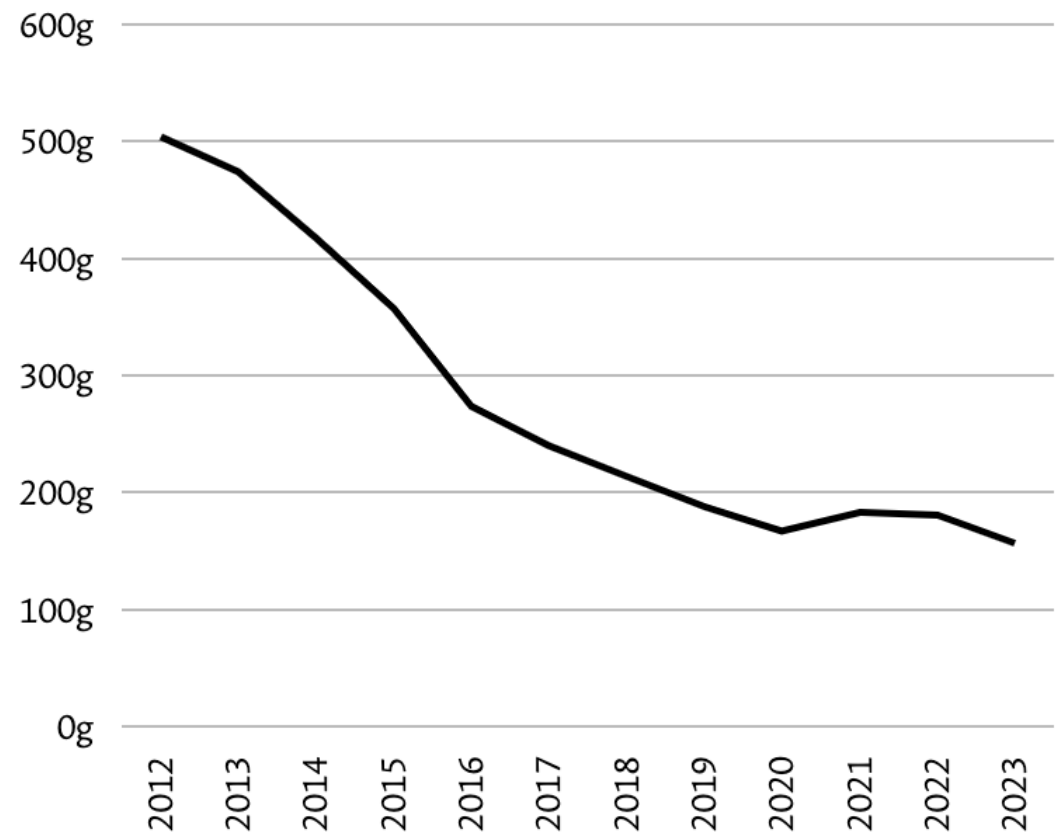


2. It's an embodied carbon issue



Domestic and overseas manufacturing scenarios of silicon-based photovoltaics: Life cycle energy and environmental comparative analysis
Yue, You, & Darling 2014

Emissions per kWh



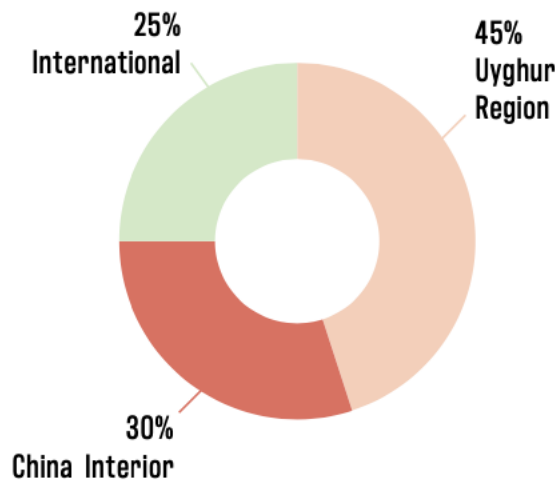
grid.iamkate.com

3. Look up the supply chain

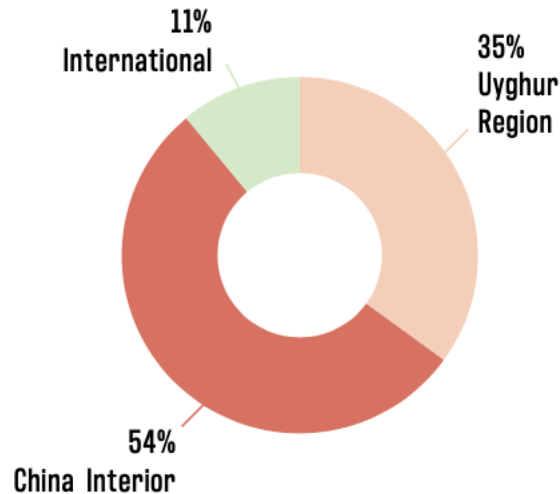
Polysilicon Market Share

Source: Bernreuter Research

2020



2022



1. Raw Materials



2. Polysilicon



3. Ingots



4. Wafers



5. Cells



6. Modules

4. There is minimal help available

- No independent supply chain auditing
- No UK assurance scheme
- No UK policy on Xinjiang
- Weak approach from consumer groups and industry
- Plenty of the right language, not much action

The report traces the supply chains of JA Solar and LONGi to silicon and polysilicon suppliers for which it found evidence of involvement in coercive labour schemes. Jinko Solar and Trina Solar were found to have also used forced labour directly.

We deducted a mark in the human rights category from these companies.

Ethical Consumer



To whom it concerns

Eurener E.E.W., states that the modules produced in our factories categorically exclude the use of raw materials from suppliers in the Xinjiang region in its supply chain.

May 2021

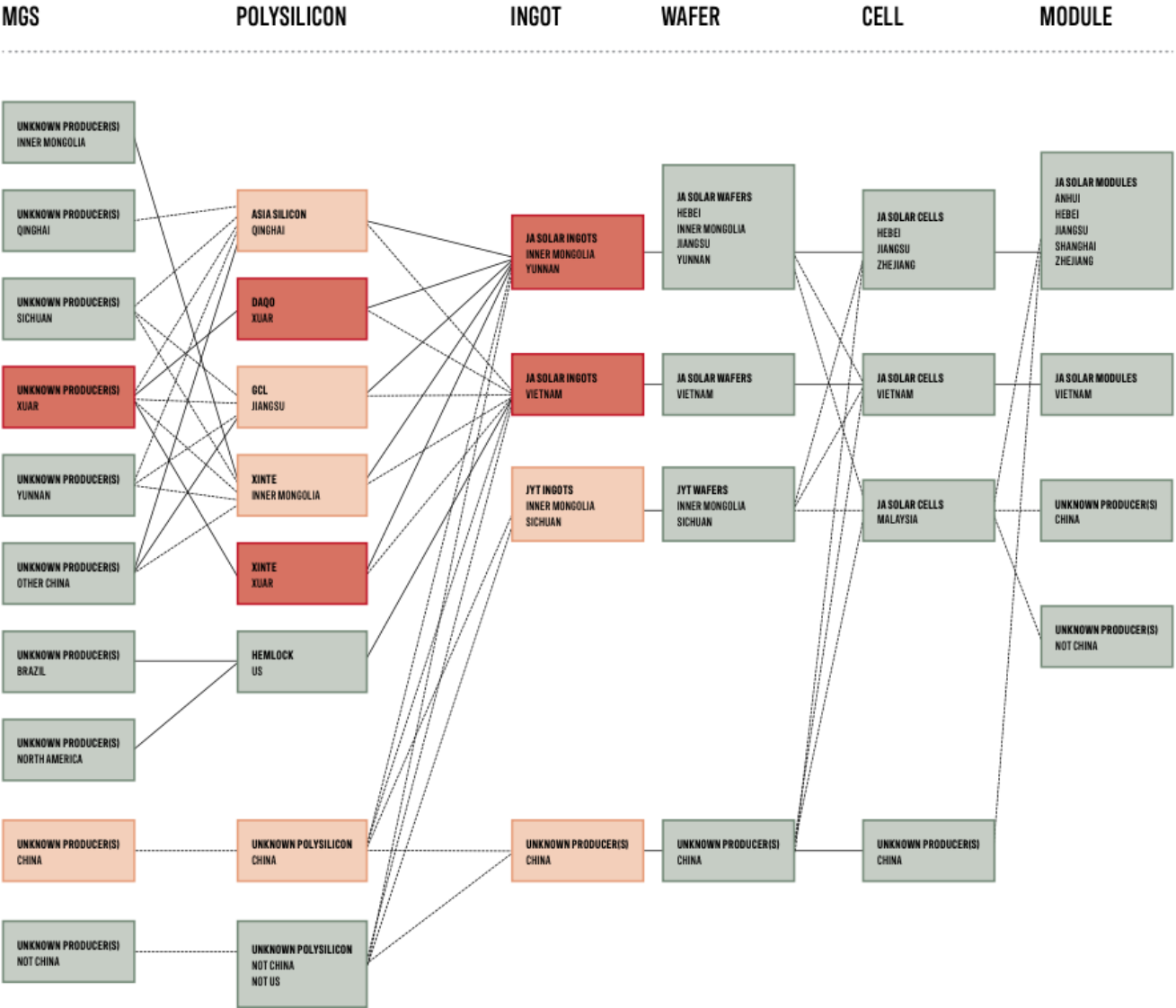


“They constantly try to escape
From the darkness outside and within
By dreaming of systems so perfect that no one will need to be good.”

T.S. Eliot Choruses from The Rock



Solid line = disclosed / known information (verified or unverified)
Dashed line = not disclosed but likely / possible



August 2023

OVER-EXPOSED:

Uyghur Region Exposure
Assessment for Solar
Industry Sourcing

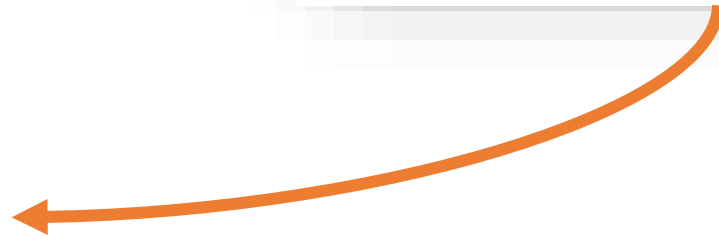
Alan Crawford, Laura T. Murphy,
and a team of anonymous researchers

Sheffield Hallam University
Helena Kennedy
Centre for International Justice



Exposure	Company
HIGH	Canadian Solar
VERY HIGH	JA Solar—Southeast Asia/US
VERY HIGH	JA Solar—China
HIGH	Jinko Solar—Southeast Asia/US
HIGH	Jinko Solar—China
VERY HIGH	LONGi Solar—Southeast Asia
VERY HIGH	LONGi Solar—China
VERY HIGH	Maxeon 3/5/6 Module / Sunpower X-/A-/M-Series
VERY HIGH	Maxeon / Sunpower Performance Series
NONE (UNVERIFIED)	Meyer Burger Technology
VERY HIGH	QCells
NONE (UNVERIFIED)	REC Group N-Peak and Alpha
VERY HIGH	REC Group TwinPeak 4
HIGH	Tongwei Solar
NONE (UNVERIFIED)	Trina Solar—Southeast Asia
VERY HIGH	Trina Solar—China

- Meyer Burger disclosed that no China-produced polysilicon is used to manufacture any wafers purchased by Meyer Burger;
- OCI and Wacker Chemie (Germany) have disclosed that no metallurgical grade silicon (MGS) produced in the XUAR is used in their polysilicon;
- However, there is no way to independently verify these disclosures.



5. There is hope



SELECT A PRODUCT CATEGORY TO **START SEARCH**

COMPUTERS & DISPLAYS



IMAGING EQUIPMENT



MOBILE PHONES



NETWORK EQUIPMENT

PHOTOVOLTAIC MODULES
AND INVERTERS

SERVERS



TELEVISIONS



Search Photovoltaic Modules and Inverters | Total 2 Results

Product Name

Product Type ▾

Manufacturer ▾

Location of Use

United Kingdom ▾

EPEAT Tier ▾

Status ▾

Where product is purchased and/or used

Advanced Filter Options

View EPEAT optional criteria ▾

SEARCH

CLEAR

The EPEAT Registry is updated daily.

2 Results Found

Product Name ▲ ▾

Manufacturer ▾

Product Type ▴ ▾

Location of Use ▴ ▾

EPEAT Tier ▴ ▾

Series 6

First Solar, Inc.

Photovoltaic modules

United Kingdom

Silver

Series 6 Plus

First Solar, Inc.

Photovoltaic modules

United Kingdom

Silver

What we can do

- Buying decisions
- New technologies
- Press coverage and internet
- Lobbying via CEE
- Join CEE Ethical Sourcing group



Ethical solar sourcing part 2

20th June 2023

Co-founder Jon Hallé looks at the human rights issues related to solar panel production and developing an ethical sourcing policy.