

UNFCCC LULUCF
 210 High income Upper-middle income Lower-middle income Low income

表-1 世界銀行データベース、所得分類 (2021-2022年)

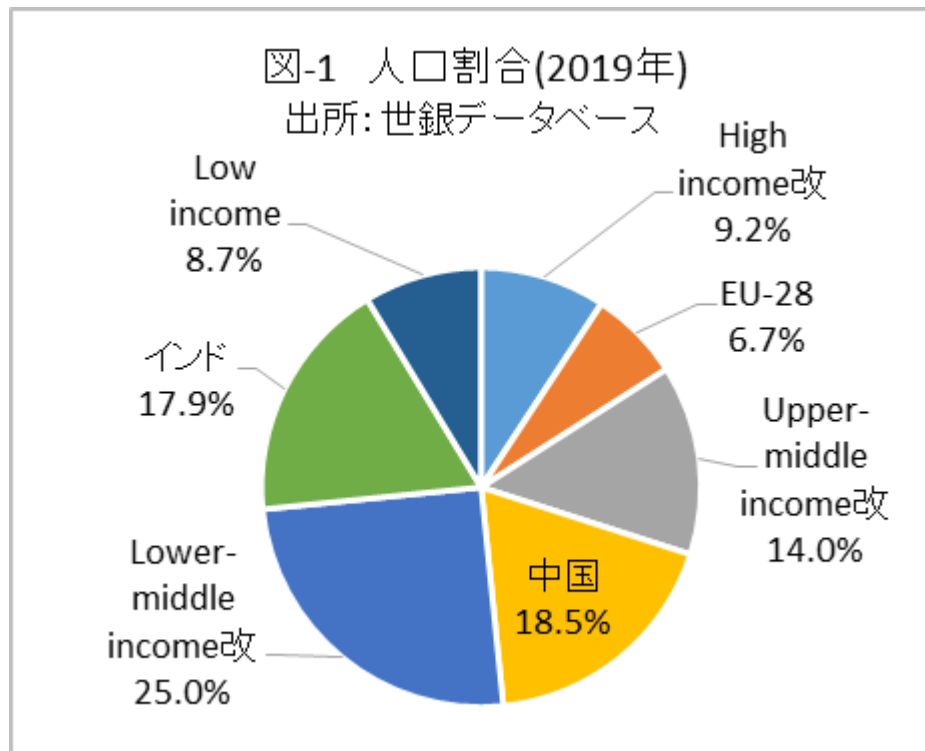
所得グループ	所得範囲 (1人当り名目GNI, US\$)
High income	> 12,695
Upper-middle income	4,096-12,695
Lower-middle income	1,046-4,095
Low income	< 1,046

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EU-28 High income High income Upper-middle income Lower-middle income

EU-28 High income Upper-middle income Lower-middle income Low income

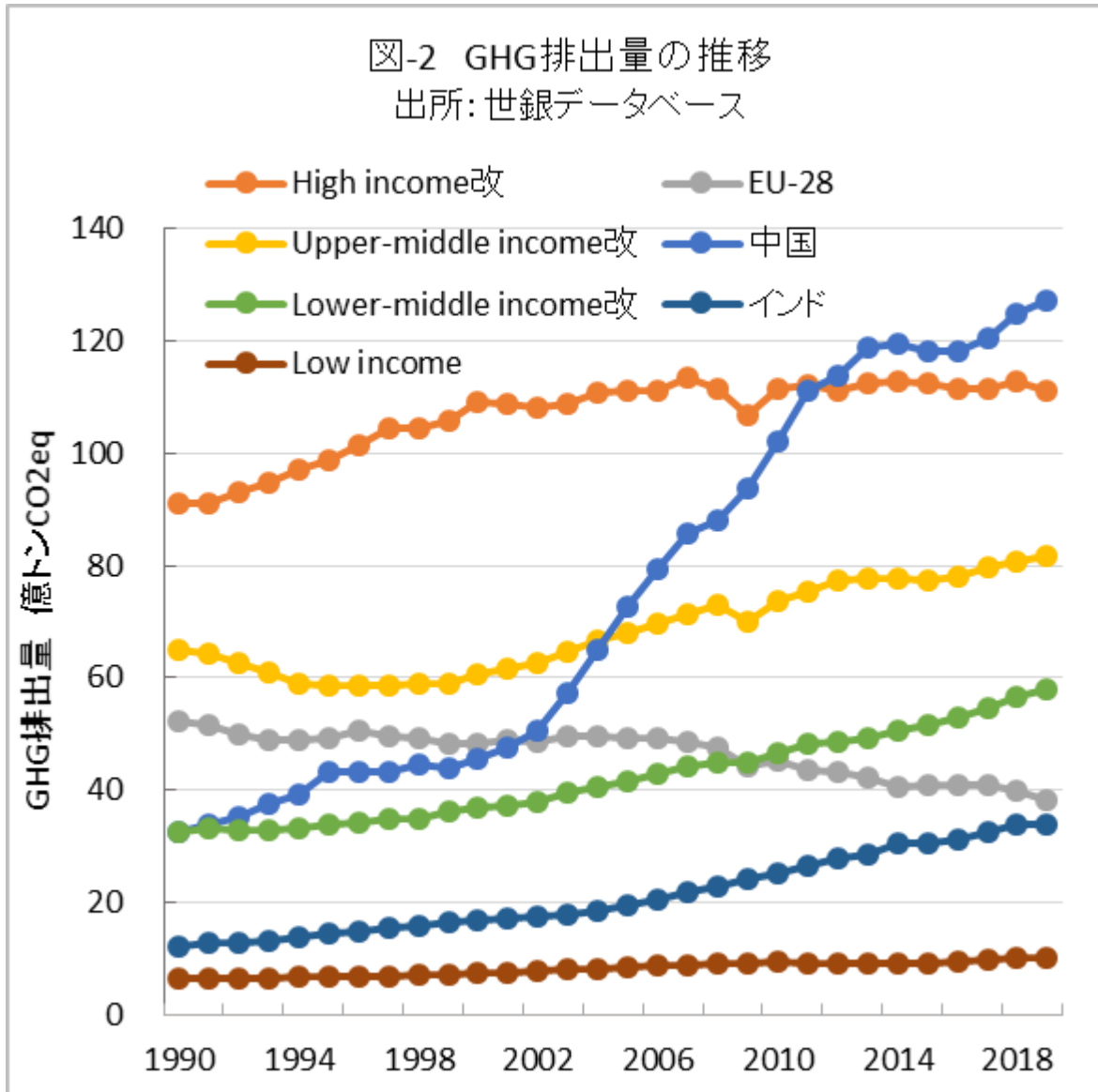
-1 2019 16%



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GHG 2010/3

GHG EU-28 High income 2010

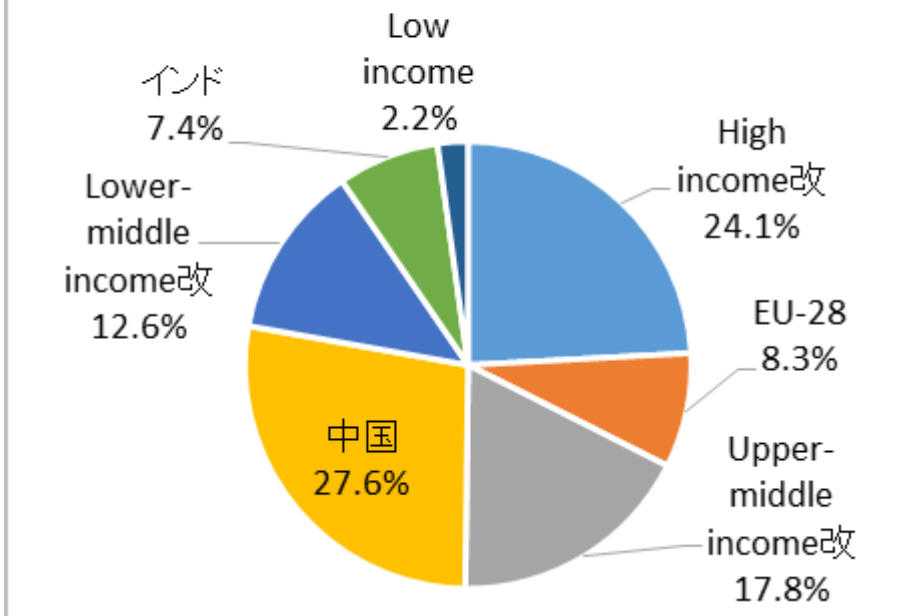


22

GHG 2019/3 GHG 2019/3 GHG 2019/3

図-3 GHG排出量割合(2019年)

出所: 世銀データベース



23

2050??GHG??????EU-28?GHG????????????GHG??
 ?GHG????????EU????????????????????????GHG????????????????????????EU?????
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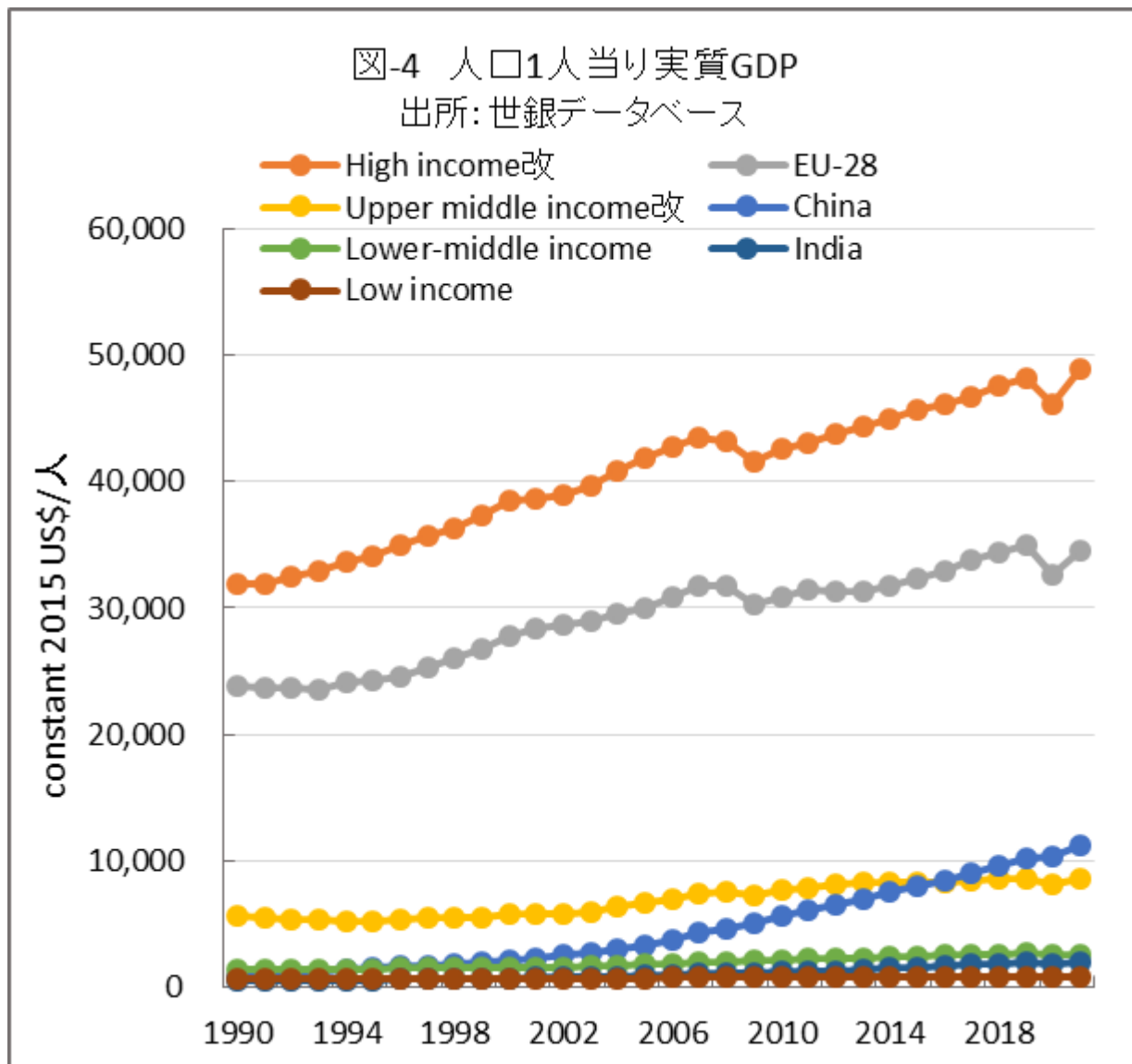
High
 income???2019?GHG??90%?????
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2050?????GHG??

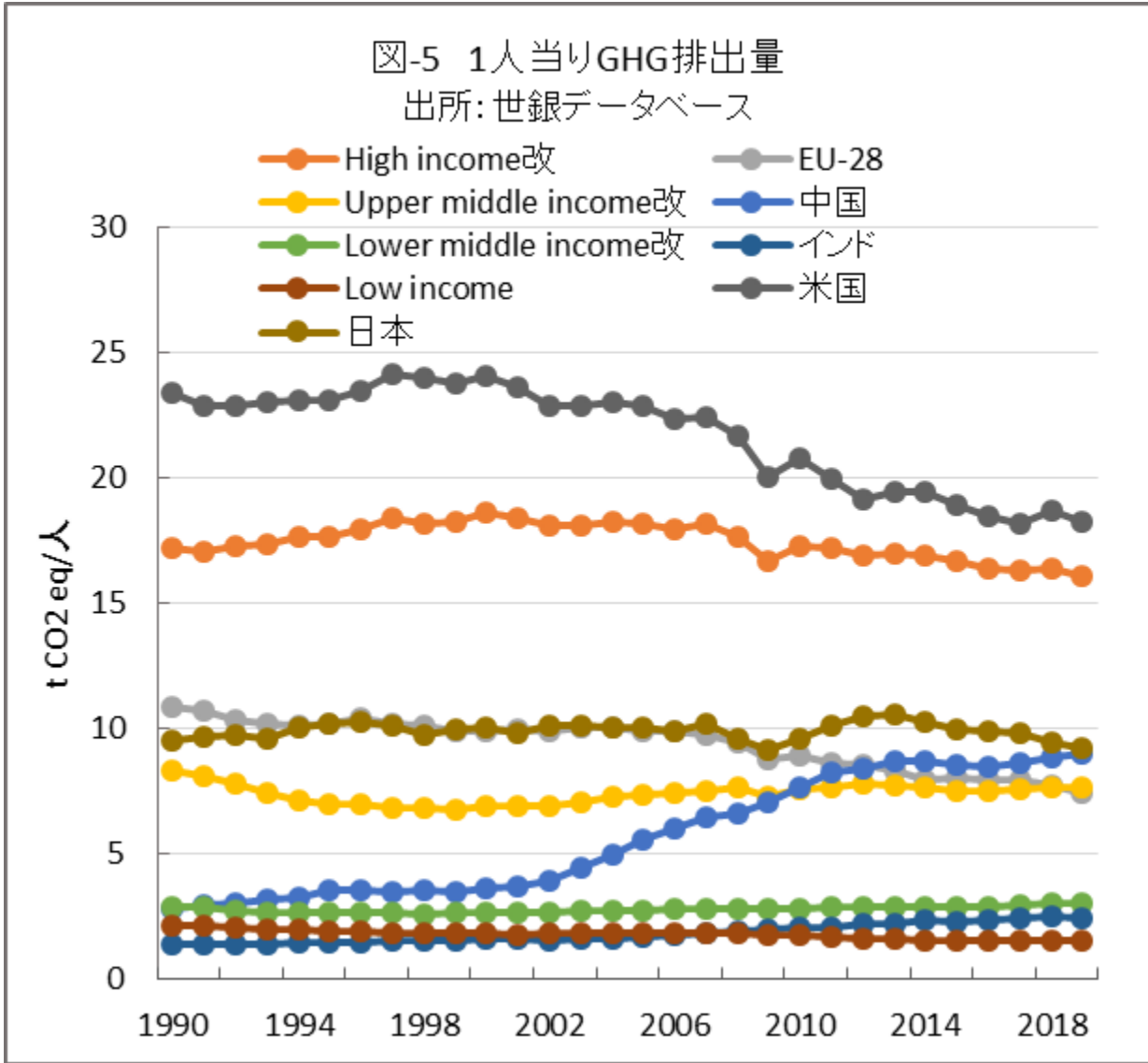
?-4??1?????GDP????????????-1?????????GNI????????????????????????????????????GDP?????G
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25

GHG????????EU????2019??1????????????Upper-middle
income?EU-28????????????1990???GHG????????????????????EU-28???High
income??GHG?????2????????????????Lower-middle
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??GHG????????CO2????2030????????????2060????????????????????????????2030????????????????
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1980??COP26????
??2070????GHG????????????????????????????????????20????????????30??GHG????????
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????????GHG??2/3????????????2050????GHG????????????GHG????????????????
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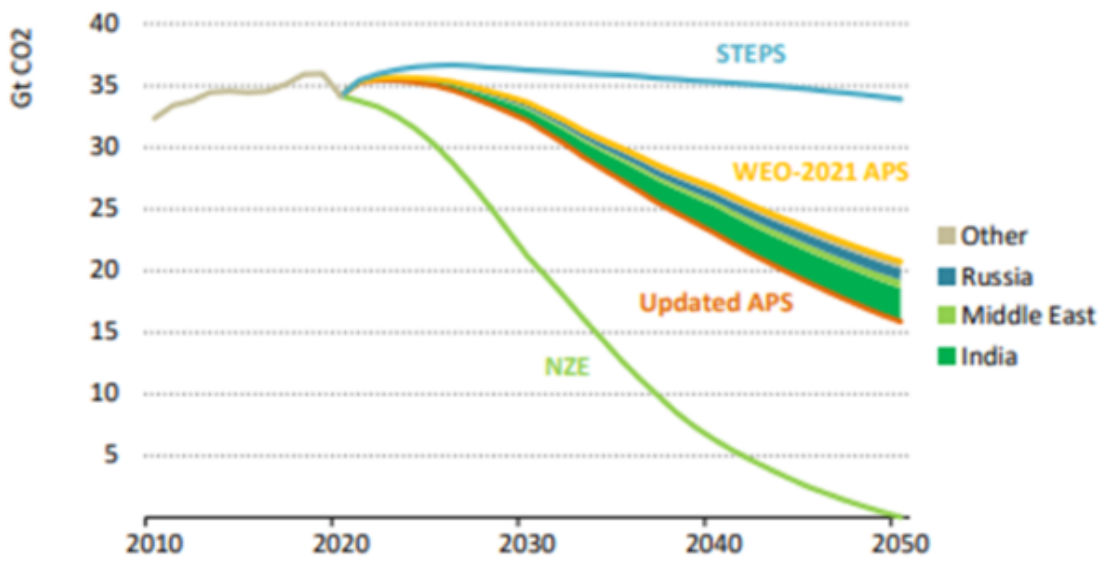
IEA??2050??CO2??????

????????IEA??2021?11??Figure
1.1??2050????CO2????????APS????????????GHG????????????NDCs??
2050????????????????????

WEO-2021 APS?2021?5????????????????????Updated
APS?2021?10????????????????????????????????????GHG??CO2????????
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????STEPS?NDCs??NZE?IEA?202
1?5????2050????????????

Figure 1.1 ▶ **CO₂ emissions in the WEO-2021 scenarios and emissions reductions from recent pledges**



IEA. All rights reserved.

Note: Other = net zero pledge by Australia and commitment to the Global Coal to Clean Power Transition Statement by Indonesia. Middle East = net zero pledges by Saudi Arabia and the United Arab Emirates.

Updated APS CO₂ 2020 35 Gt CO₂ 2050 16 Gt CO₂ 55% STEPS 2020 2050 CO₂ ???

2050 IEA GHG 2050 GHG

2050 GHG 2050 GHG

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1970 kindle

Posted in ?, ? | No Comments »

“We own the science”

· Friday, October 21st, 2022



LewisTsePuiLung/iStock

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NEW – UN Secretary for Global Comms says they "own the science" on "climate change," and opposing viewpoints have now been pushed down in search results through their partnership with Google.
pic.twitter.com/fMaPYsHGUT

— Disclose.tv (@disclosetv) October 2, 2022

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?Tackling

Disinformation??COVID-19????????????????????????????????
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You Tube??TikTok?????????Team
Halo????????????????????

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twitter????????Democratic Dictatorship?George Orwell????????????????

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Farm??
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Disinformation????????????????WEF????????????????COVID-19????????????????????????????
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Posted in ???, ????? | No Comments »

ESG????????3E?S????????????

?? ?? · Thursday, October 20th, 2022



ipopba/iStock

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EU??

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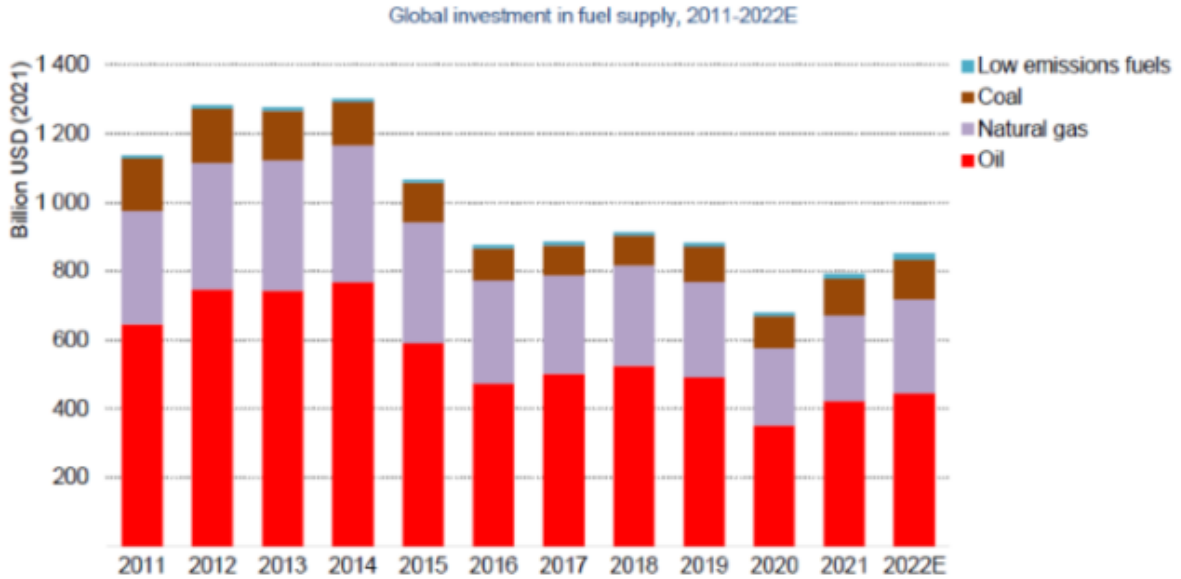
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???World Energy Investment 2022, IEA

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???IEA?????????Net Zero by 2050????????2050????????????????????????????????1.5????????????????????????????????
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2021??STEPS????????2030????????????????
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ESG?

ESG
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Economy Environment Energy
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ESG 2.0?

ESG
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2050 2030

ESG
ESG
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ESG 2.0

Posted in [ESG](#), [ESG](#) | [No Comments](#) »

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?? ?? · Thursday, October 20th, 2022



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MadamLead/iStock

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?SDGs??

Posted in ??????????, ??? | No Comments »

11??COP27????????????????????????????????????

?? ?? · Sunday, October 16th, 2022

11?6??????11?18??27????????COP27?????????

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Asiya Hotaman/iStock

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GFANZ????????45????????500????????????????GFANZ????????????Race to Zero????????????

????COP27????GFANZ????????????????????

??Climate Change Dispatch????????????JPMorgan Chase, Morgan Stanley, Bank of America????????????????????????????????GFANZ????????????????????????????????

U.S. Banks Threaten To End Support For UN Climate Edicts Over Legal Risks – Climate Change Dispatch

?GFANZ??GFANZ????????????????

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??JPMorgan Chase
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????CEO??
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‘Road to hell for America’: JP Morgan CEO snaps back at Rep. Taib on fossil fuels

- $5775 \times 31 \times 3 \div 4 = 13.4$
 $5775 \times 31 \times 1 \div 4 = 4.48$
 2. $4.48 \times 0.5 \div 10000 = 0.00022$
 3. $100 \times 0.00022 \times 0.06 = 0.0013$

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- 4.5
- 0.00022
- 0.0013
- $100 \times 0.00022 \times 0.06 = 0.0013$
 $100 \times 0.00022 \times 0.06 = 0.0013$

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■ エネルギー起源CO₂排出量

各部門が、それぞれ現状（2019年）から半減を目指すものとして提示（ただし、現状までに大幅削減の部門は考慮）

(単位：万t-CO₂eq)

	2000年 (基準)	2019年 (現況)		2030年(目安)			東京都 環境基本計画 (現行) (2000年比)
	排出量	排出量	2000年比	排出量 (目安)	部門別目標 (2000年比)	2019年比	
産業・業務部門	2,727	2,763	1.3%	1,381	約50%程度削減	▲50.0%	20%程度削減
産業部門	679	381	▲43.9%	222		▲41.8%	
業務部門	2,048	2,382	16.3%	1,159	約45%程度削減	▲51.3%	(20%程度削減)
家庭部門	1,283	1,612	25.6%	728	約45%程度削減	▲54.8%	20%程度削減
運輸部門	1,765	940	▲46.7%	612	約65%程度削減	▲34.9%	60%程度削減
エネルギー起源CO₂ 計	5,775	5,315	▲8.0%	2,721		▲48.8%	

(参考)

廃棄物部門 計	120	190	58.3%	137	2017年比 40%削減 ※1	▲27.9%	
その他ガス (フロン等) 計	325	706	117.2%	252	2014年比 約65%程度削減 ※2	▲64.3%	
温室効果ガス排出量 合計	6,220	6,211	▲0.1%	3,110		▲49.9%	

※ 1 家庭と大規模オフィスビルからの廃プラスチック焼却量の削減目標
 ※ 2 代替フロン (HFCs) の削減目標

2030????????????????????? 2022???

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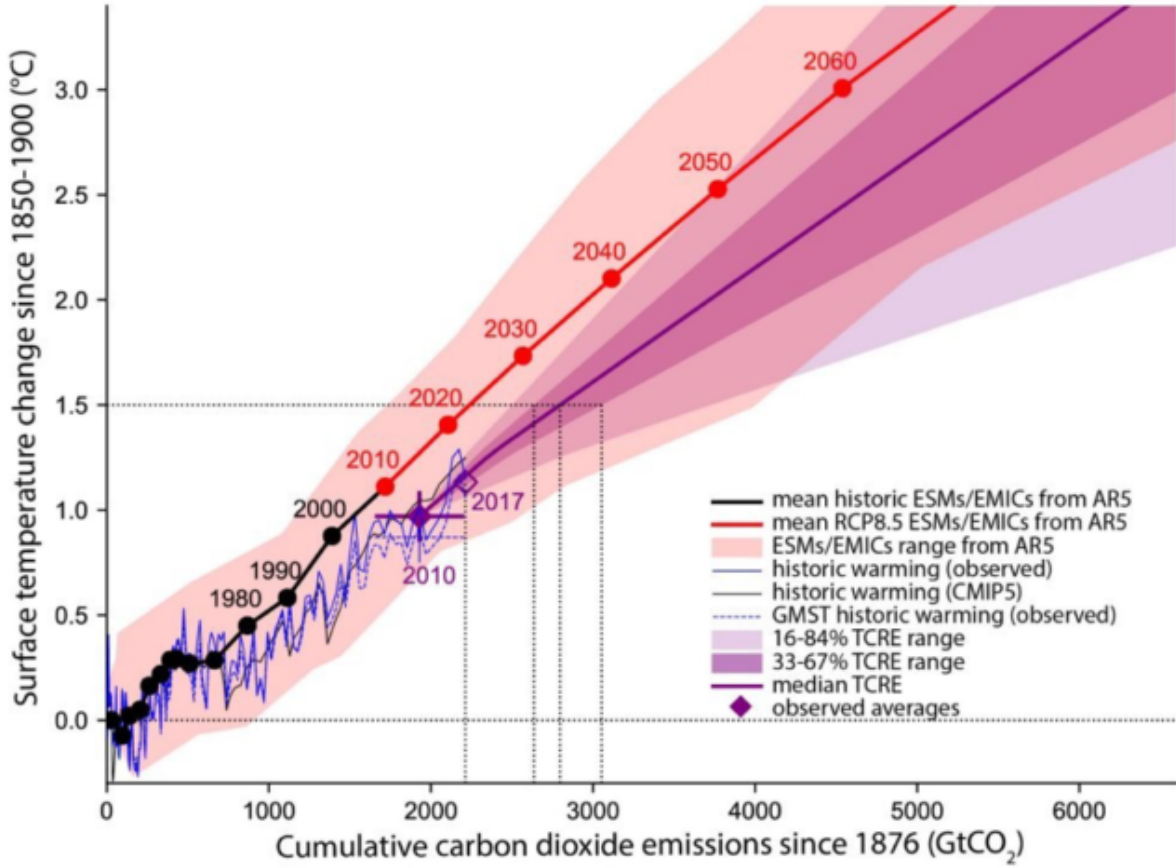


FIGURE 2.3?Temperature changes from 1850–1900 versus cumulative CO2 emissions since 1st January 1876.

??IPCC

3.??

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Posted in ???, ????? | No Comments »

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y-studio/iStock

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?SDGs??

Posted in ??????????, ??? | No Comments »

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?? ?? ? - Sunday, October 9th, 2022

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bee32/iStock

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allanswart/iStock

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Posted in ???, ?? | [No Comments »](#)

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?? ?? · Tuesday, October 4th, 2022



Daniele Mezzadri/iStock

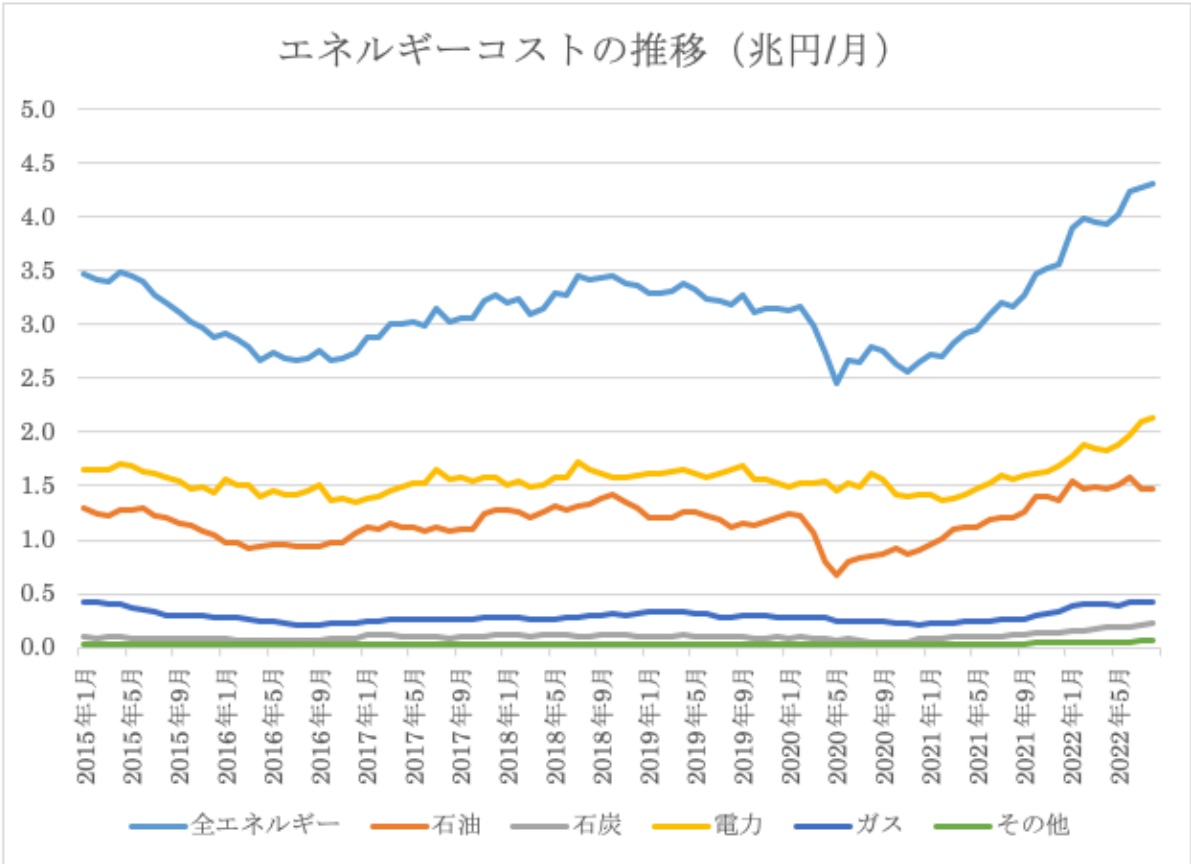
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Posted in ??????????, ??? | No Comments »

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?? ?? · Monday, October 3rd, 2022



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Posted in ??????????, ???, ????? | No Comments »

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?? ?? · Sunday, October 2nd, 2022

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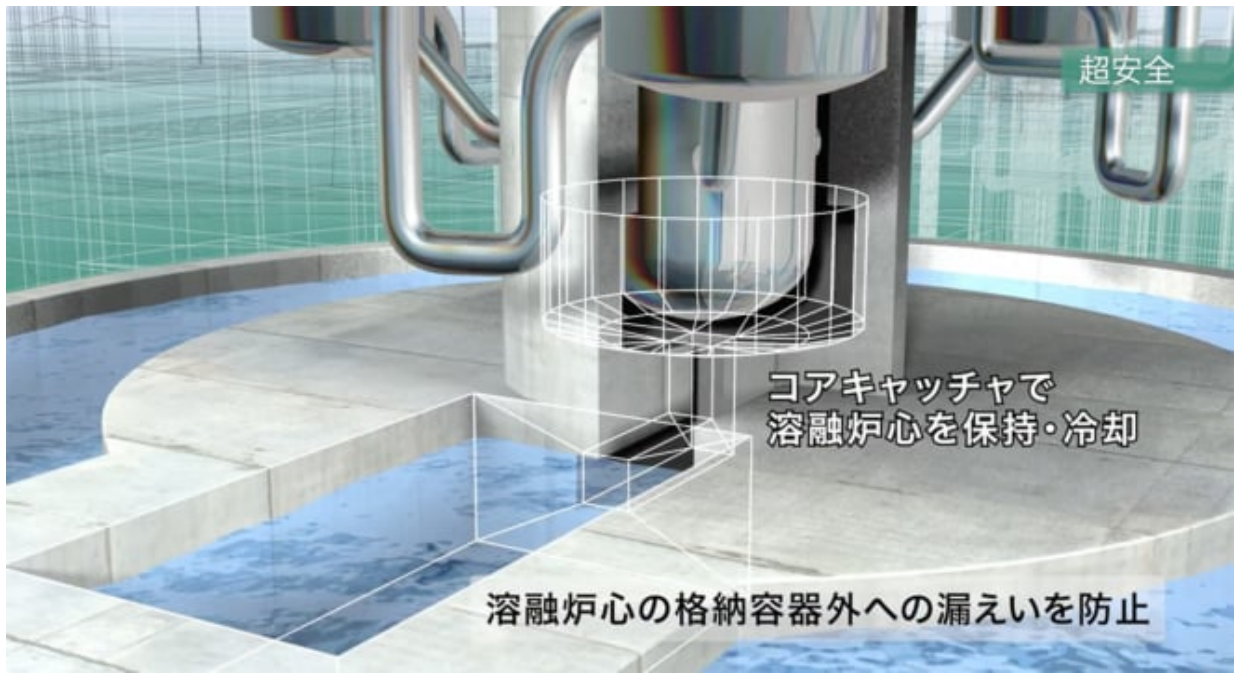
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SRZ1200?????

S?????Super-safe?????????????????Sustainability??R?????(Resilience)????Z?????????Zero-Carbon????????????

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DiscoverMHI (Mitsubishi Heavy Industries, Ltd.)??

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Posted in ???, ?????????? | No Comments »

NHK????????????????????????????

?? ?? · Sunday, October 2nd, 2022



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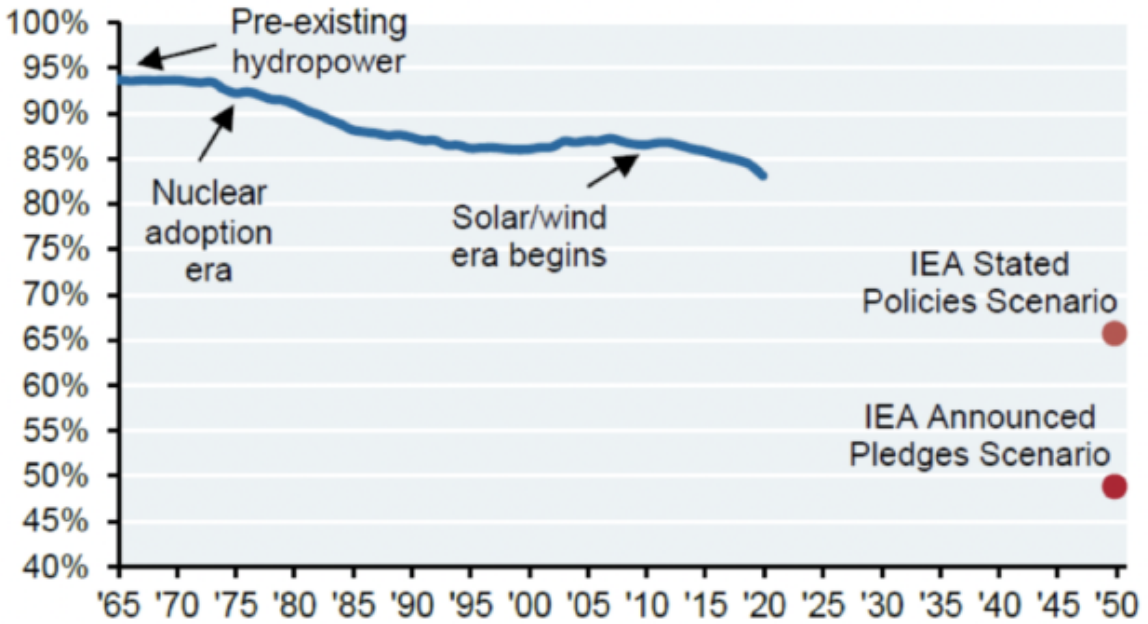
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The world uses fossil fuels for ~83% of its energy
% of global primary energy consumption from coal, oil and nat gas



Source: BP Statistical Review of World Energy, IEA, JPMAM. 2021.

Posted in GPER, ??????????, ????? | No Comments »

NHK????????????????????????????????

?? ? · Saturday, October 1st, 2022

925??NHK????????????????????1.5????????????????



Twitter??

NHK? record 1.5? NHK? 1.5?

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Posted in ??????????, ??, ????? | No Comments »

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?? ?? · Thursday, September 29th, 2022

2050????????????2030?CO2??ESG????????
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xijian/iStock

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sectors??2021.11.04????????

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Posted in ?????????, ?? | [No Comments »](#)

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?? ?? · Monday, September 26th, 2022

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small smiles/iStock

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Posted in ???, ????? | No Comments »

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?? ?? · Saturday, September 24th, 2022



halbergman/iStock

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米インフレ抑制法の気候変動対策支出内訳

(¥140/\$)

	億ドル/10年	億円/10年
グリーン電力投資・生産税控除	1,603	224,420
再エネ		651
CCS		32
原子力		300
技術中立		621
クリーン燃料税控除	234	32,760
クリーン自動車税控除	155	21,700
自家用車(最大\$7500/台)		89
商用車		36
郵便公社		30
クリーン製造業税控除	403	56,420
多排出事業者向け補助金	95	13,300
建築物クリーン化補助金	453	63,420
農業再エネ化支援	126	17,640
気候対策農業支援	153	21,420
その他	293	41,020
	3,515	492,100

(7月27日CBO分析ベース:成立法とは異なる)

出典:電力中央研究所 上野貴弘氏レポート <https://criepi.denken.or.jp/jp/serc/discussion/22007.html>

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Posted in ??????????, ??, ?? | No Comments »

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?? ?? · Sunday, September 18th, 2022

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14

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Posted in ???, ????? | No Comments »

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?? ?? · Thursday, September 15th, 2022



igorartmd/iStock

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Posted in ???, ?? | No Comments »

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?? ?? · Wednesday, September 14th, 2022

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CEO??EU????????????????????????50????????????????????????

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herraez/iStock

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CEO??

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Posted in ???, ?? | No Comments »

??21????????????????ESG????????????

?? ?? · Saturday, September 10th, 2022

ESG??
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LumerB/iStock

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8?24????????????????????????????????10?350????????????6????????13??
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ESG
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WV

824 WV ESG

11 WV 14

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NOMURA ESG

Pe w Research Center
12
53
65
12

ESG SDGs 21

Posted in ???, ?? | No Comments »

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?? ?? · Friday, September 9th, 2022

SPD
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audioundwerbung/iStock

??6????????????????????LNG????????????????
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Posted in ???, ?? | [No Comments »](#)

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?? ? · Saturday, September 3rd, 2022



ayhan turan/iStock

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??????372????2420????????????????????176????1650????????????????????

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CO2 CO2 150 ppm

1 30 0.2 0.3

2 IPCC

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3 80 60

HP 10 1950 60 1993 30

4 CO2

1000

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5 CO2

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Posted in ???, ????? | No Comments »

????????LCOE????????

?? ?? · Thursday, September 1st, 2022



vchal/iStock

IRENA J.P.Morgan

IRENA

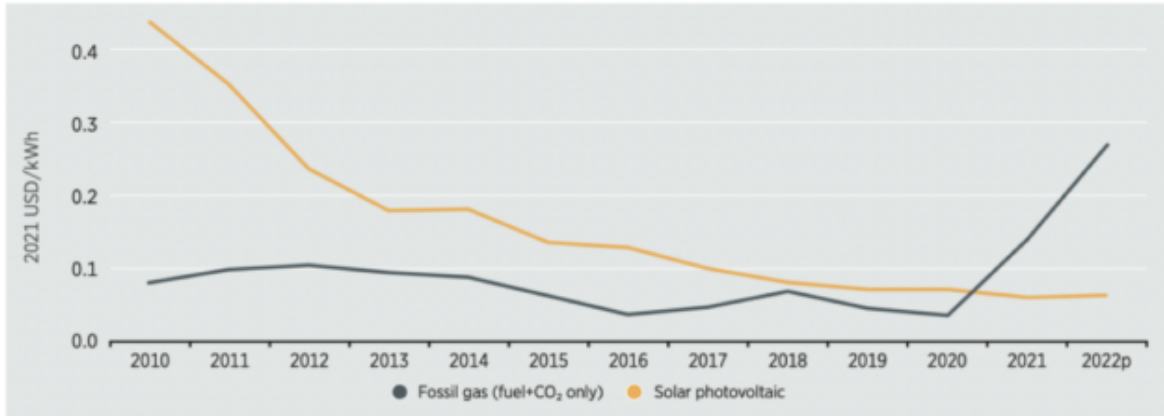
2022 13 IRENA 2021

Renewable Power Generation Costs in 2021 – Executive Summary (irena.org)

IRENA

- 2021 163GW LCOE G20
-
-

Figure ES.3 The weighted average LCOE of utility scale solar PV compared to fuel and CO₂ cost only for fossil gas in Europe, 2010-2022



?????2021?8?????????????2030????????????????????

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2. J.P.Morgan?????

?????5?J.P.Morgan????????????????????

12th Annual Energy Paper | J.P. Morgan Private Bank (jpmorgan.com)

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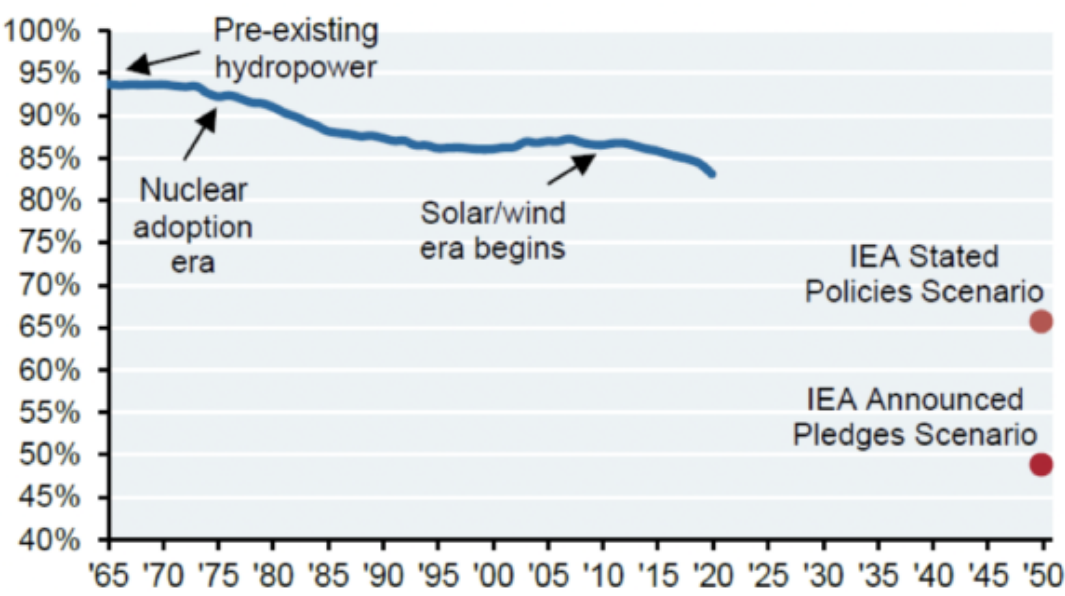
?2050??????

IEA?????????????????????????????2050?????????????66?????

??10????????????????????????????
?????????????????70???

The world uses fossil fuels for ~83% of its energy

% of global primary energy consumption from coal, oil and nat gas



Source: BP Statistical Review of World Energy, IEA, JPMAM. 2021.

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????????????LCOE??LCOE????????????
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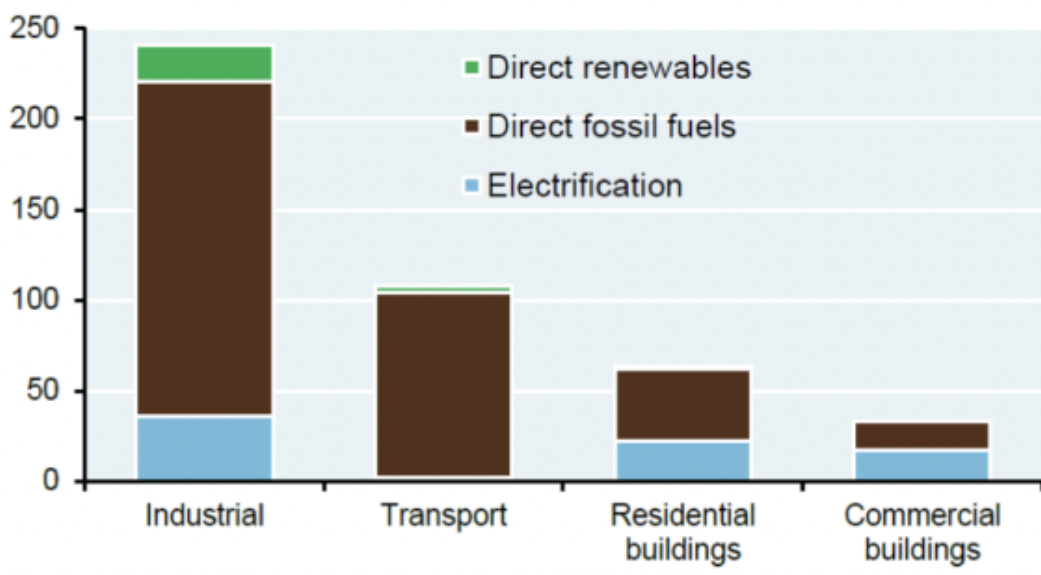
LCOE??i)???????????????????????????? ii)????????????????
iii)??

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Low levels of electrification in global industry and transport

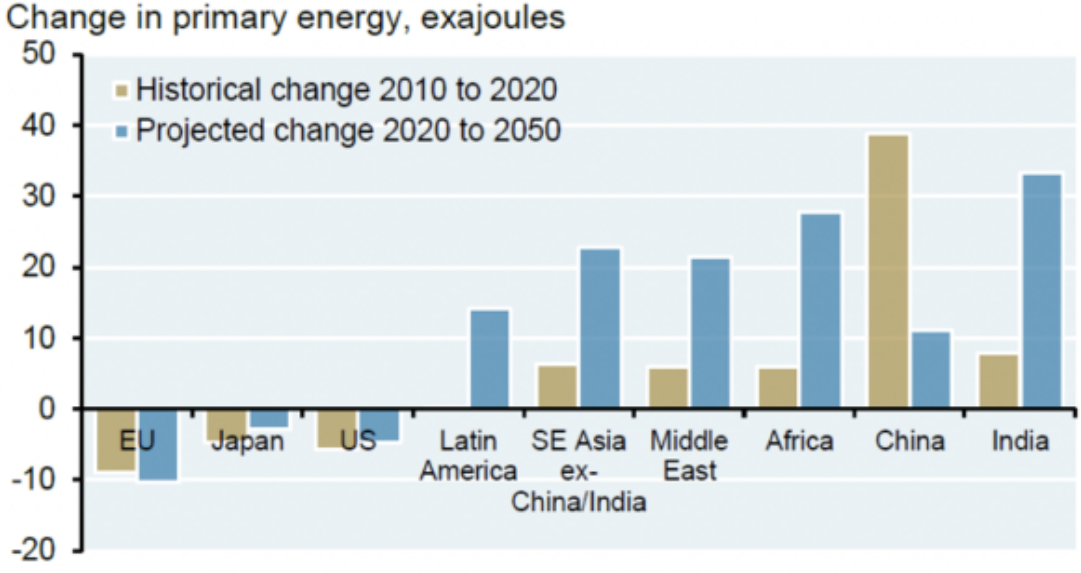
Quadrillion BTUs of final energy consumed by sector



Source: Energy Information Administration, JPMAM. 2021.

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China is the only EM country projected to slow primary energy consumption growth over the next three decades



Source: International Energy Agency Stated Policies Scenario. 2021.

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3. LCOE??FCOE?

?????LCOE??
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LCOE??
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 ???LCA????????????????????FCOE?Full cost of electricity????????????????

Posted in ??????????, ??? | [No Comments »](#)

COP27????????????????????????????

?? ?? · Monday, August 29th, 2022



imagedepotpro/iStock



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????????????200????????11??CO₂????????????????
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????????????????????COP????????1997??COP3????????????????????????????COP3?1997??12????????????
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COP??
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COP????26????????????????????????????COP????????????????2015??COP21????????????

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????CO₂????????????????????????

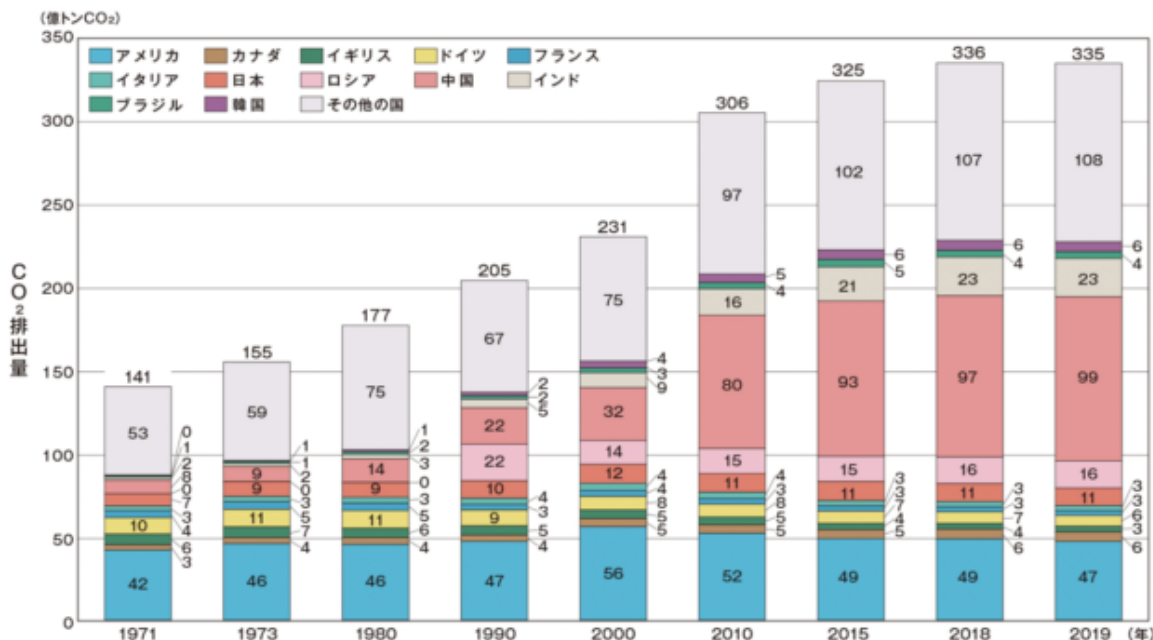
COP????????????????????26??

????????????????????????????CO₂????????????????CO₂????????????????????????????????
????????????????????????COP??

CO₂????????????????????????????????????

????CO₂????????2000??230????2019???1.5??340????????????

世界のCO₂排出量の推移



(注) 四捨五入の関係で合計値が合わない場合がある
 ロシアについては1990年以降の排出量を記載。1990年以前については、その他の国として集計

出典：（一財）日本エネルギー経済研究所「エネルギー―経済統計要覧2022」より作成

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?CO₂????COP????CH₄????CH₄????CO₂?80????20????GWP-20????C H₄????????2030????????30????????????

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???2030?????5800????????????????

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Posted in ???, ????? | No Comments »

GX????????????????

?? ?? · Sunday, August 28th, 2022



marrio31/iStock

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8?24????2?GX(????????????????)??????????

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?3?(???????????: ABWR)????????????????????????????16????????????77????23?4????

??20????????????
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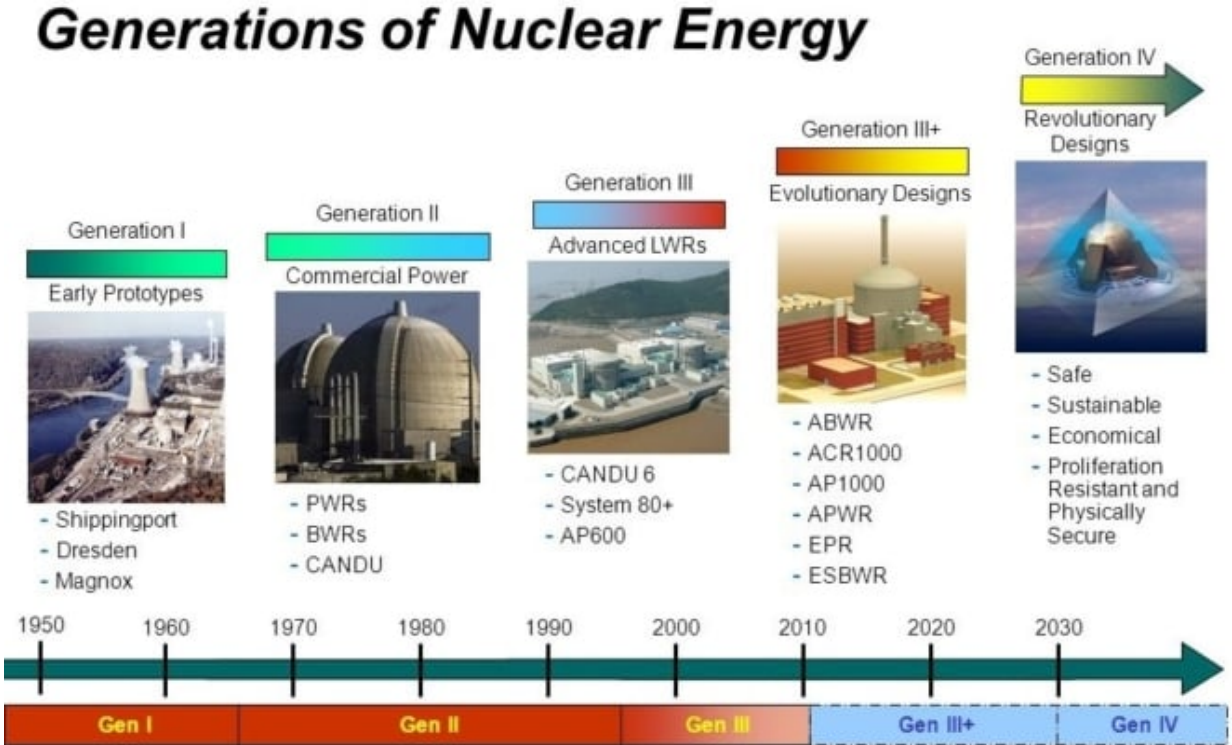
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????6?7????5????2?4????????????3????????????1????

ABWR????3?????????????????????(APWR)?AP1000?EPR?????APWR????????????????
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??SMR????????SMR????
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©?GIF(Generation IV International Forum)

©Westinghouse Electric Corporation.

Current Plants) safety by design (passive safety)
AP1000 ESBWR
ATMEA EPR APWR ABWR
AP1000

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ABWR APWR ATMEA

ABWR APWR
ABWR 6 7 3 11

ABWR ABWR

4 3 4 PWR APWR
APWR safety by
design ATMEA

Posted in , , | No Comments »



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?? · Friday, August 26th, 2022

GX

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7 10

	【新規建設に向けた方針等】	【既設炉の運転延長に向けた方針等】
 アメリカ	<ul style="list-style-type: none"> エネルギー省「革新的原子炉実証プログラム」等 2 炉の建設支援、8 炉型の研究開発支援 (2020) 老朽石炭火力をSMR等で置換可能と分析 (2022) 	<ul style="list-style-type: none"> 運転期限なし (40年+20年単位延長) 現時点で80年までの運転延長認可は6 基 さらに9 基について審査中
 イギリス	<ul style="list-style-type: none"> ジョンソン首相「エネルギー安保戦略」(2022/4) 2050年までに発電割合を25%に、24GWの導入 1 基/1 年に建設ペース加速へ、支援を抜本拡充 	<ul style="list-style-type: none"> 運転期限なし (10年ごとに安全審査) 2035年に40年となるサイズウェル原発で 20年延長を検討中
 フランス	<ul style="list-style-type: none"> マクロン大統領「新規原子炉計画」(2022/2) 2050年へ大型革新軽水炉14基を建設・検討 建設・運営主体の電力会社EDFを完全国有化 	<ul style="list-style-type: none"> 運転期限なし (10年ごとに安全審査) 56基中20基が40年超運転へ 運転延長も対象にグリーンファイナンス検討中
 オランダ	<ul style="list-style-type: none"> 新連立政権「政策協定」公表 (2021/12) 新たに2基を建設する方針を表明 	<ul style="list-style-type: none"> 運転期限は法律で規定 (期間のルールなし) 60年運転認可済の原発の再延長方針を表明
 韓国	<ul style="list-style-type: none"> 尹大統領「エネルギー政策の方向性」(2022/7) 2030年原発割合30%以上、国内2基建設等 	<ul style="list-style-type: none"> 運転期限なし (10年ごとに安全審査) 既設炉の継続運転手続きの迅速化を表明

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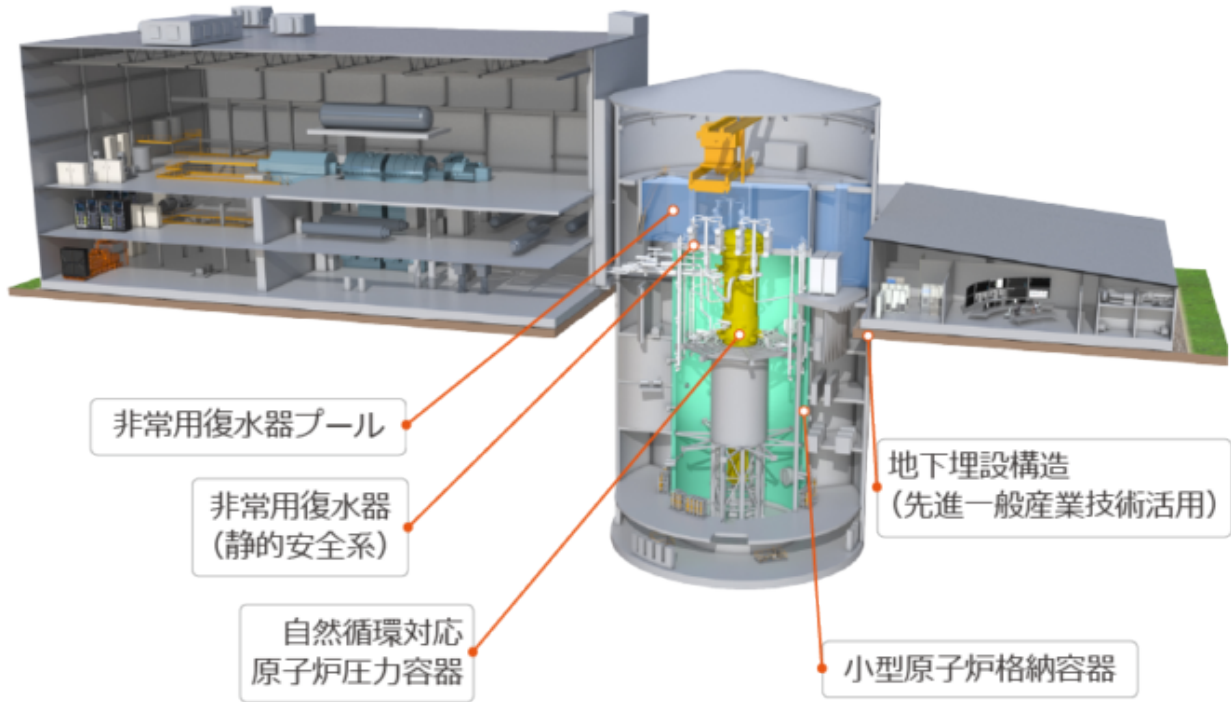
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??APWR????????????????????3????
??ABWR????????????

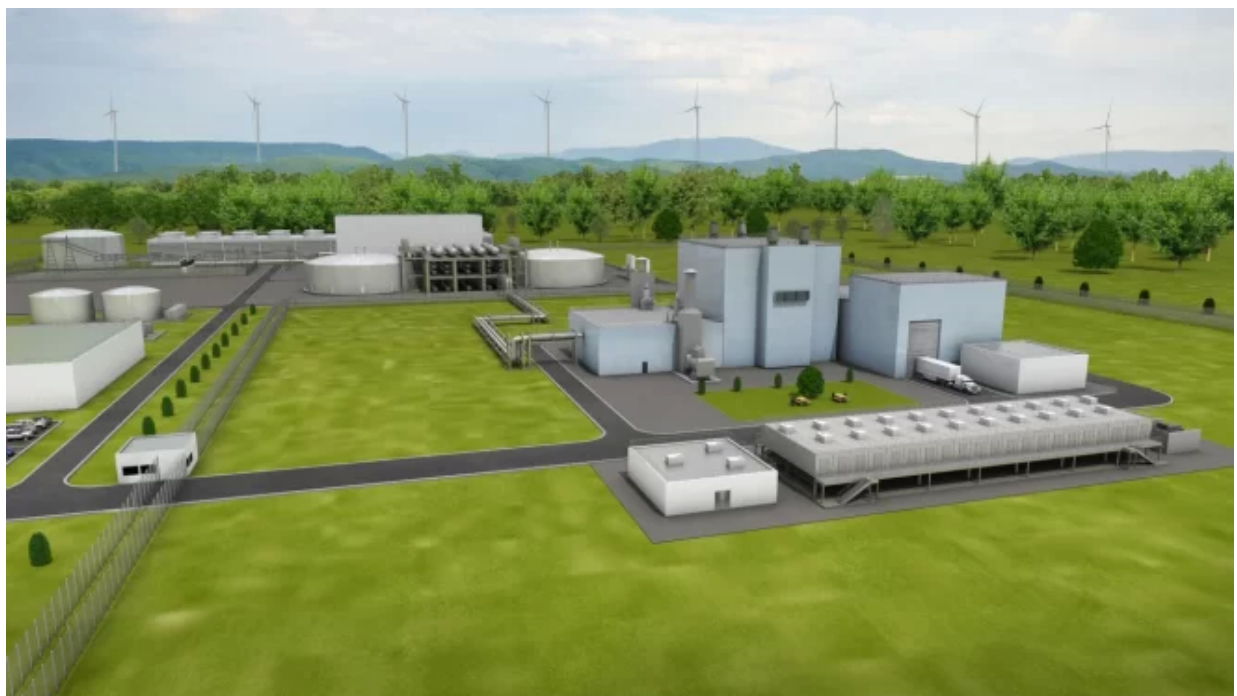
SMR?????7?kW??

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Posted in ??????????, ??, ????????? | No Comments »

?2035????????EV????????????????

?? ?? · Friday, August 26th, 2022



Naeblys/iStock

2025????1000????????????????????EV????????????????????

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??EV????????????????????
60??CO₂????????????

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Posted in ??????????, ??? | No Comments »

1.5????????????????

?? ? · Thursday, August 25th, 2022

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poco_bw/iStock

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??2030????????????2030??45????????????????????????

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everybody's business is nobody's business ??????????

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Posted in [????????????](#), [??](#), [????](#) | [No Comments](#) »

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?? ?? · Wednesday, August 24th, 2022



mirza kadic/iStock

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??8????1????????25
0?????3???????3???120?????1.65?????????????????

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???2kWh?????????????????575?????8?????????????????

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???LNG?????????????????

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Welcome to Japan!

“Welcome to Japan!”

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Posted in [???, ??](#) | [No Comments](#) »