IET The Institution of Engineering and Technology

150 1871 - 2021

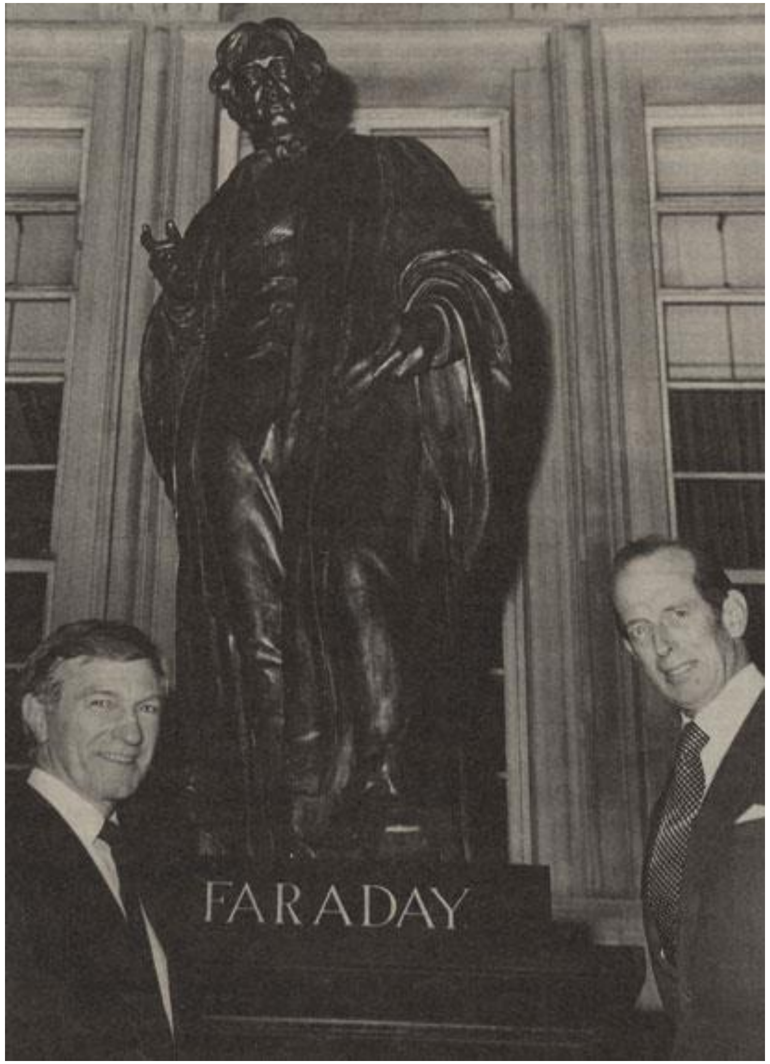
深耕底层数据，实现精准揭示

-Inspec高效检索，助力科技兴国

IET英国工程技术学会 刘闯

2021年5月

IET简介



- 成立于1871年的非盈利机构
- 欧洲最大的工程技术专业机构
- 全球150国家拥有16.9万会员
- 提供世界一流的出版和信息服务

THE 150 SHOW

- The 150 Show – 17 May – The Health Edition 健康关注
- The 150 Show – 18 May – The Green Edition 绿色环保
- The 150 Show – 19 May – The People Edition 科技人才
- The 150 Show – 20 May – The Digital Edition 技术发展
- The 150 Show – 21 May – The Youth Edition 青少年培养

https://celebrate150.theiet.org/whats-happening/the-150-show/

IET学术资源

•Inspec: 科技文摘数据库	IET Inspec
•Inspec Analytics 学科分析工具	Inspec Analytics
•IET电子书	IET eBOOK COLLECTIONS
•IET期刊	IET JOURNALS
•IET.TV 工程领域视频类数据库	IET.TV

150
1871 - 2021

IET Inspec 120+ Years

Year	Event
1898	Inspec Archive
1969	Inspec computerised production system
1970	Magnetic tape service
1973	Inspec available via first vendor DIALOG
1987	Chemical & Numerical Indexing introduced
1993	Winner Best Information Product Award for Data Quality
1998	SilverPlatter offers site licences
2004	Online Inspec Archive
2008	10m records launch of Inspec Direct
2009	40th anniversary
2016	Inspec 2 program
2018	Launch of Inspec Analytics
2019	50th anniversary
2020	20m records launch of Inspec

10m records
Physics

7m records
Electrical and electronic engineering

5.5m records
Computing and control engineering

2.2m records
Production, manufacturing & mech. engineering

1969 to date

20+ m records
May 2021

or 1898 with the Archive
Optional Archive adds another
873,699 records

In 2020

980,000
records added

3,000 other publications
from 700 publishers

45,00
journals

Over
15%
open
access


The Institution of Engineering and Technology
Inspec
50 years
of Inspec
A legacy of excellence since 1969

Inspec 数据收录类型

期刊

开放获取

会议论文

2000万数据

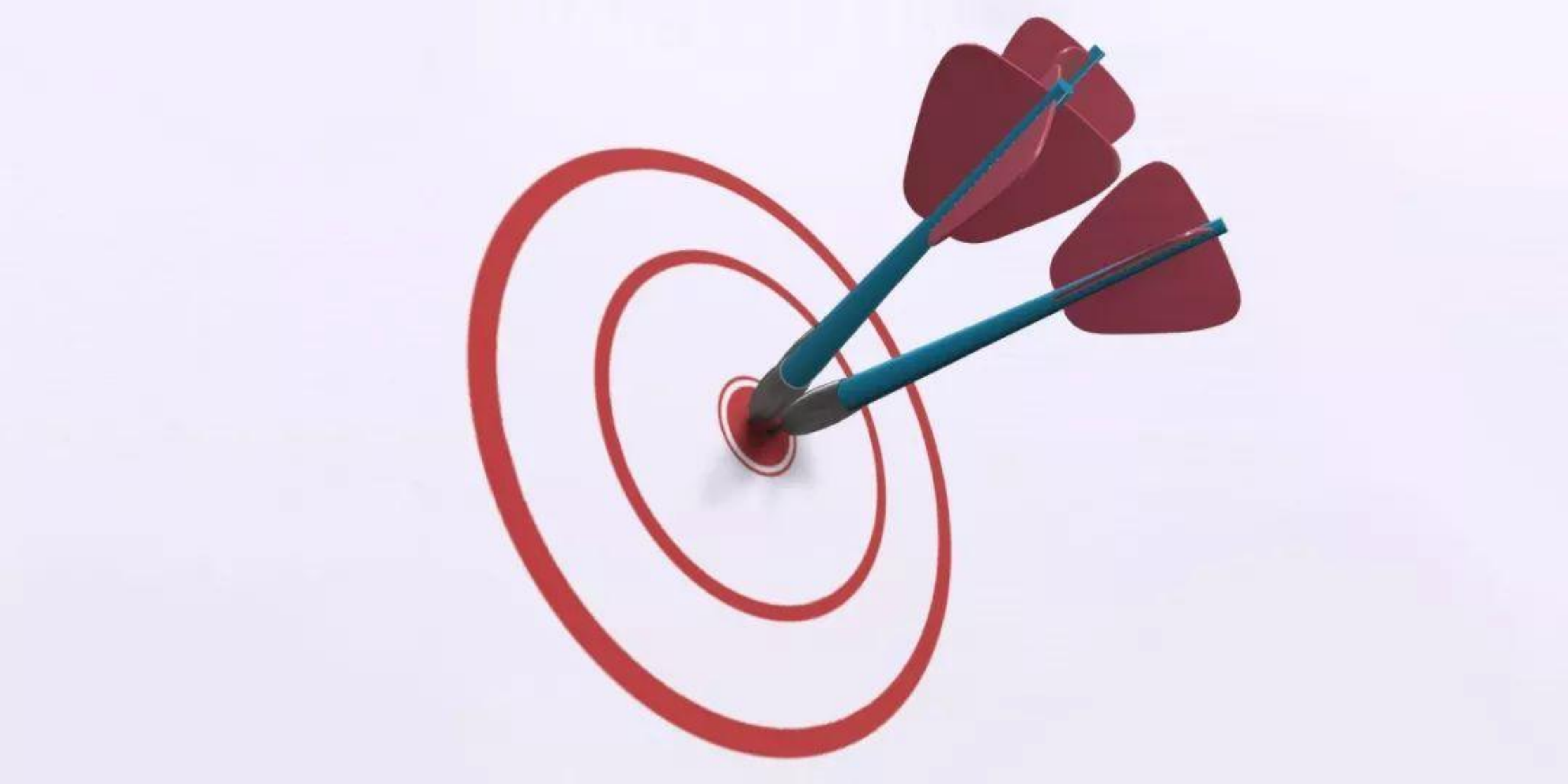
预印本

学位论文

图书

- 不仅仅是120+年的积累
- 数据专家，人工标引
- 科技文献语料库
- 每周更新

详细人工底层数据标引，成就数据精准发现



HST/WFPC2 snapshot imaging of symbiotic stars
作者:Brocksopp, C.; Bode, M.F.; Eyres, S.P.S.
DOI: 10.1046/j.1365-8711.2003.06915.x

HST/WFPC2 snapshot imaging of symbiotic stars

作者: Brocksopp, C.; Bode, M.F.; Eyres, S.P.S.
查看 Web of Science ResearcherID 和 ORCID (由 Clarivate Analytics 提供)

Monthly Notices of the Royal Astronomical Society
卷: 344 **期:** 4 **页:** 1264-70
DOI: 10.1046/j.1365-8711.2003.06915.x
出版年: 1 Oct. 2003
文献类型: Journal Paper

出版社原始摘要信息

摘要

The results of a HST/WFPC2 snapshot imaging survey of selected symbiotic stars in 1999/2000 are presented. Seven sources - HD 149427 (PC 11), PU Vul, RT Ser, He2-104 (Southern Crab), V1329 Cyg (HBV 475), V417 Cen and AS 201 -were observed in filters F218W (ultraviolet continuum), F502N ([O III]lambdalambda 4959, 5007) and F656N (Halphalambda 6563); an eighth source, RS Oph, was observed in F437N ([O III]lambda 4363), F502N and F656N. The presence of extended emission was detected in He2-104, V1329 Cyg and possibly HD 149427. In He2-104, we detected the [O III] and Halpha counterparts to the inner lobes found in [N II] by Corradi et al. For V1329 Cyg, comparison with previously published HST/FOC results indicates expanding ejecta which may be associated with an ejection event in 1982 (+or-2 yr) at a velocity of 260 +or- 50 km s^{-1} in the plane of the sky and at an assumed distance of 3.4 kpc. We also present previously unpublished radio images of HD 149427, which we have obtained from the archives of the Australia Telescope Compact Array and which reveal the presence of extended emission at a similar orientation to that of the possible optical extension. Finally, we also include HST/WFPC2 GO observations of AG Peg and detect possible extended emission in the F218W filter.

作者信息

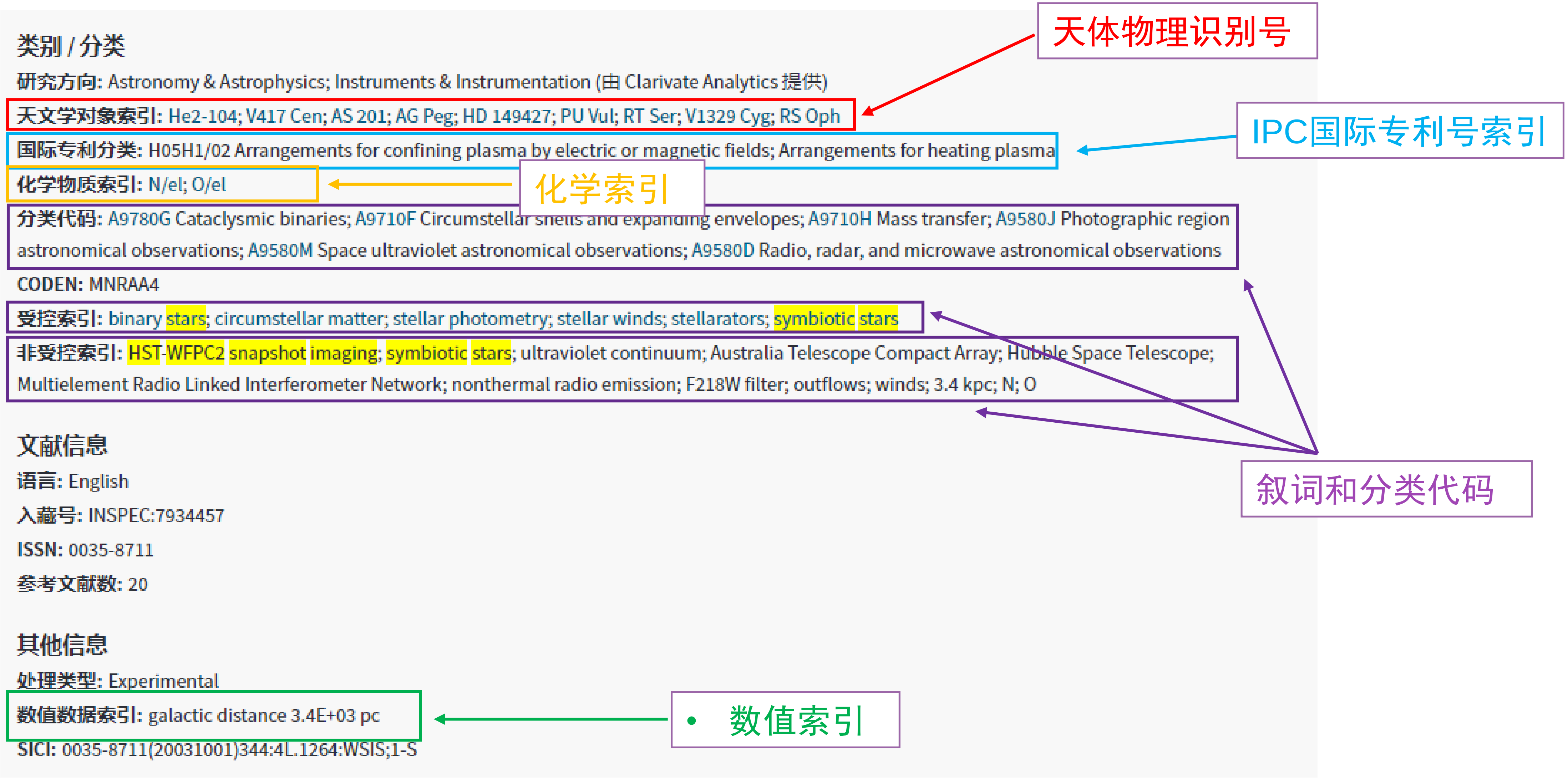
作者地址: Brocksopp, C.; Bode, M.F.; Astrophys. Res. Inst., Liverpool John Moores Univ., Birkenhead, UK.

出版商

Blackwell Science for R. Astron. Soc., UK

Inspec人工标引信息

Inspec独特的人工底层标引数据，允许每篇文章可以通过多角度进行揭示，精准查询文献同时保证避免遗漏。



类别 / 分类

研究方向: Astronomy & Astrophysics; Instruments & Instrumentation (由 Clarivate Analytics 提供)

天文学对象索引: He2-104; V417 Cen; AS 201; AG Peg; HD 149427; PU Vul; RT Ser; V1329 Cyg; RS Oph

国际专利分类: H05H1/02 Arrangements for confining plasma by electric or magnetic fields; Arrangements for heating plasma

化学物质索引: N/el; O/el

分类代码: A9780G Cataclysmic binaries; A9710F Circumstellar shells and expanding envelopes; A9710H Mass transfer; A9580J Photographic region astronomical observations; A9580M Space ultraviolet astronomical observations; A9580D Radio, radar, and microwave astronomical observations

CODEN: MNRAA4

受控索引: binary stars; circumstellar matter; stellar photometry; stellar winds; stellarators; symbiotic stars

非受控索引: HST-WFPC2 snapshot imaging; symbiotic stars; ultraviolet continuum; Australia Telescope Compact Array; Hubble Space Telescope; Multielement Radio Linked Interferometer Network; nonthermal radio emission; F218W filter; outflows; winds; 3.4 kpc; N; O

文献信息

语言: English

入藏号: INSPEC:7934457

ISSN: 0035-8711

参考文献数: 20

其他信息

处理类型: Experimental

数值数据索引: galactic distance 3.4E+03 pc

SICI: 0035-8711(20031001)344:4L.1264:WSIS;1-S

天体物理识别号

IPC国际专利号索引

化学索引

叙词和分类代码

- 数值索引

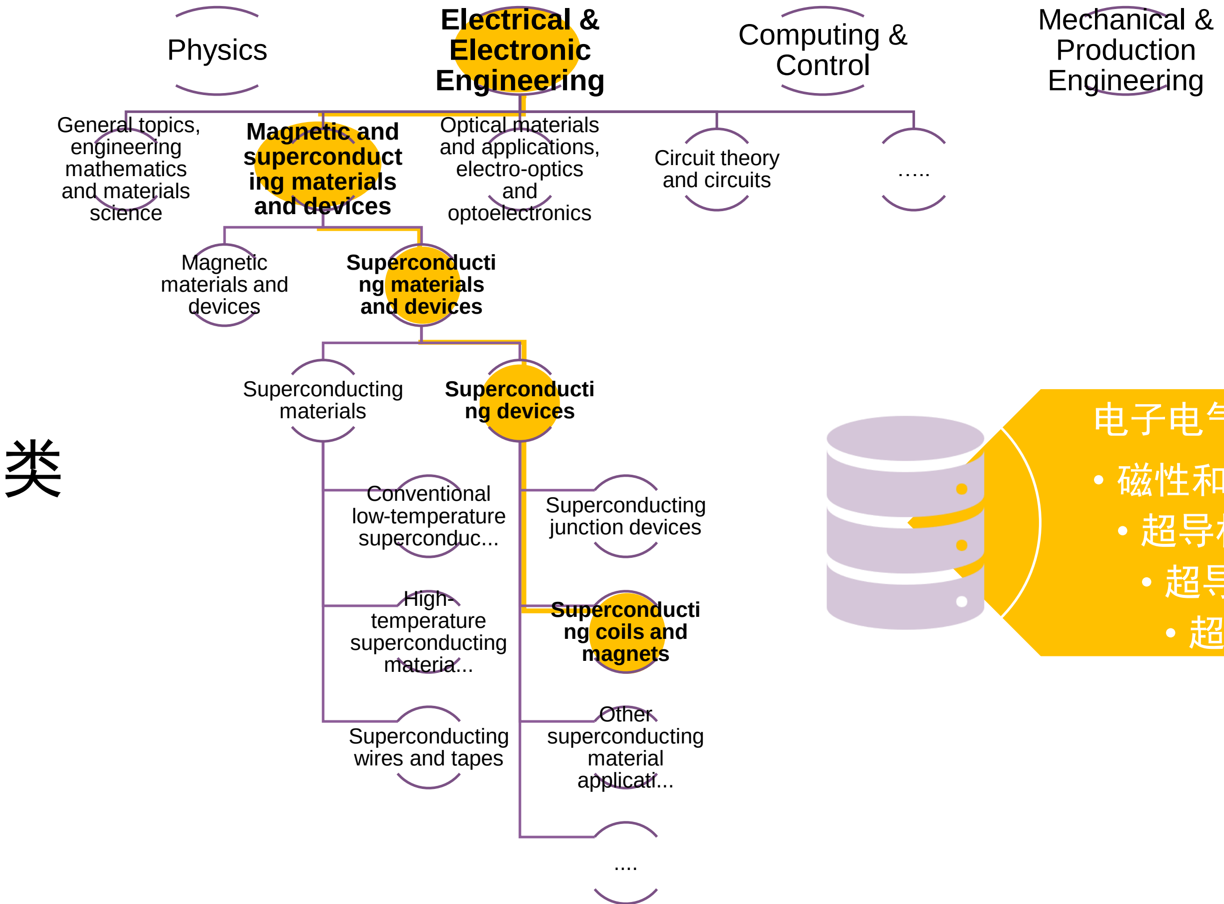
150
1871 - 2021

叙词和学科分类

9988 个控制词和10000+非控制词

Mercury (element)
≠
Mercury (planet)

3571个学科分类



- Physics
- **Electrical & Electronic Engineering**
  - General topics, engineering mathematics and materials science
  - **Magnetic and superconducting materials and devices**
    - Magnetic materials and devices
    - **Superconducting materials and devices**
      - Superconducting materials
        - Conventional low-temperature superconduc...
        - High-temperature superconducting materia...
        - Superconducting wires and tapes
      - **Superconducting devices**
        - Superconducting junction devices
        - **Superconducting coils and magnets**
        - Other superconducting material applicati...
        - ....
  - Optical materials and applications, electro-optics and optoelectronics
  - Circuit theory and circuits
  - .....
- Computing & Control
- Mechanical & Production Engineering

电子电气工程
- 磁性和超导材料和器件
  - 超导材料与器件
    - 超导装置
      - 超导线圈和磁铁

Chemical index
化学索引

为所有涉及到无机化合物和材料物质的研究所建立的控制索引

- 可以检索涉及单一化学元素或化合物的所有文献（/el、/bin、/ss）
- 可以检索与某一化学元素作为吸附物（/ads）、掺杂物（添加物）（/dop）相关的所有文献
- 可以检索与某一化合物或合金的表面（/sur）或界面物质（/int）相关的所有文献

Numerical Indexing
数值索引

为所有涉及到数值数据的研究所建立的标准化索引

- 数值按科学记数法表示：
  - 18000 = 1.8E+04
- 物理性质（多达47种参数）
  - 如：频率、温度、功率、长度等

“十四五“七大前沿技术

量子信息

脑科学

人工智能（AI）

集成电路

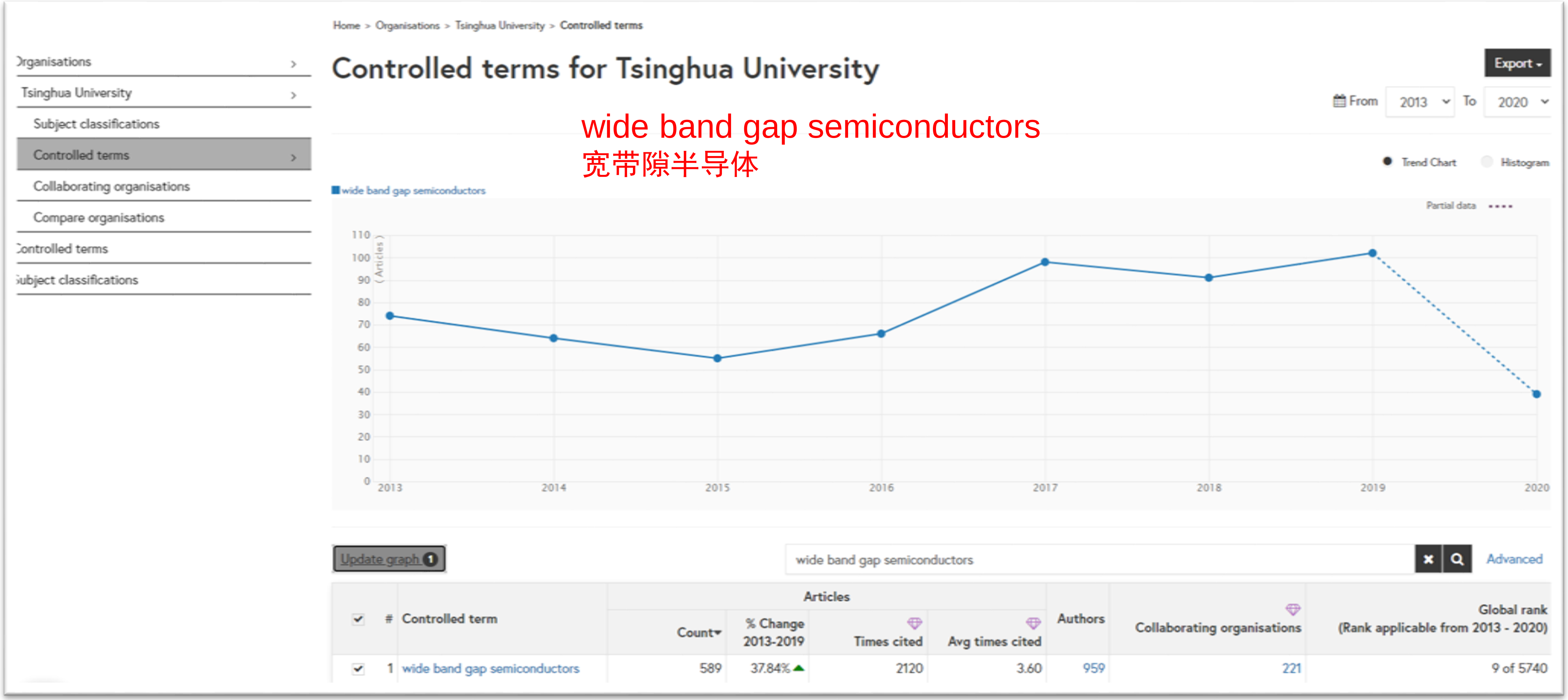
基因组与生物技术

临床医学与健康

外太空、地球深层、深海和极地研究

- INSPEC Analytics
- https://inspec-analytics-app.theiet.org

- 3,571 学科分类
- 9,988 控制词
- 29,545 机构
  - 16K 学术机构, 5K 企业, 3K 政府机构
    1.2K 医疗单位, 3.3K 其他

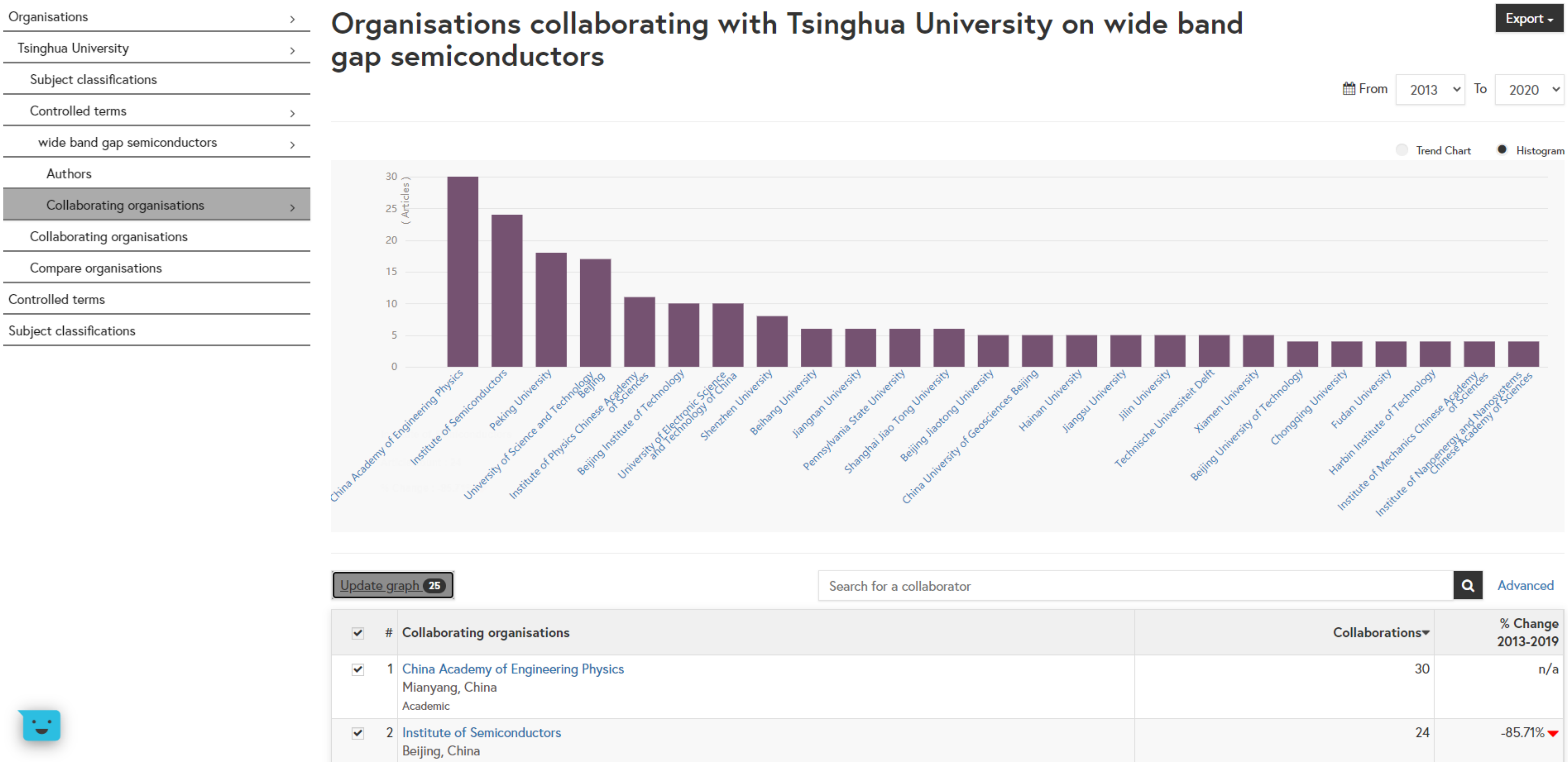


Controlled terms for Tsinghua University

wide band gap semiconductors
宽带隙半导体

☑	#	Controlled term	Articles				Authors	Collaborating organisations	Global rank (Rank applicable from 2013 - 2020)
			Count	% Change 2013-2019	Times cited	Avg times cited			
☑	1	wide band gap semiconductors	589	37.84% ▲	2120	3.60	959	221	9 of 5740

控制词:宽带隙半导体—清华大学已有合作机构



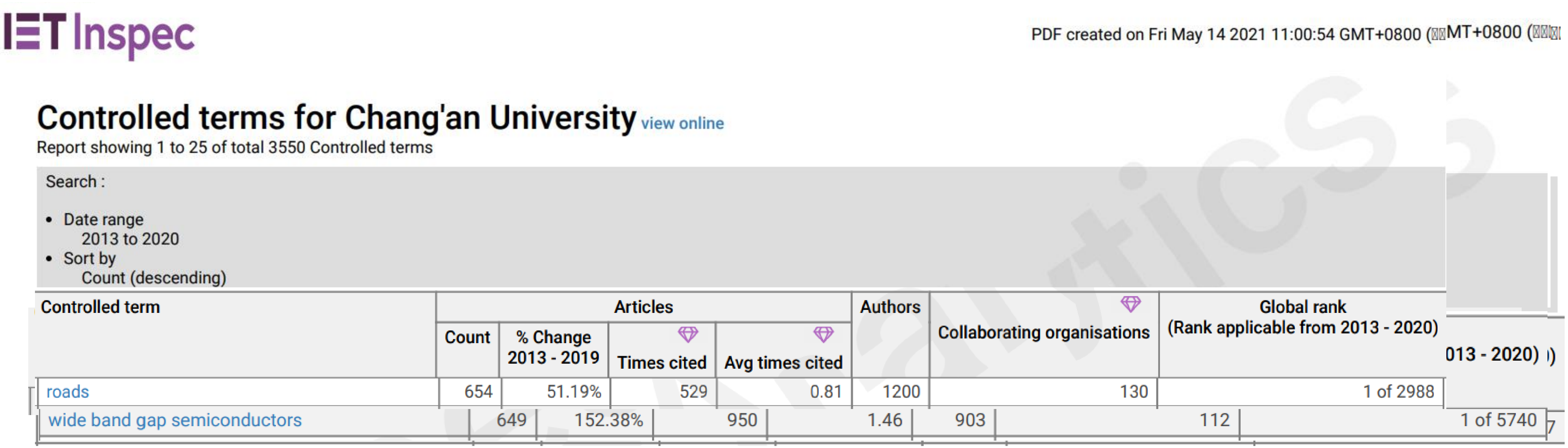
- Organisations ›
  - Tsinghua University ›
    - Subject classifications
    - Controlled terms ›
      - wide band gap semiconductors ›
        - Authors
        - Collaborating organisations ›
    - Collaborating organisations
    - Compare organisations
- Controlled terms
- Subject classifications

Organisations collaborating with Tsinghua University on wide band gap semiconductors

☑	#	Collaborating organisations	Collaborations▾	% Change 2013-2019
☑	1	China Academy of Engineering Physics Mianyang, China Academic	30	n/a
☑	2	Institute of Semiconductors Beijing, China	24	-85.71% ▼

西安高校学科分析

[illegible]宽带隙半导体



PDF created on Fri May 14 2021 11:00:54 GMT+0800 (

Controlled terms for Chang'an University view online

Report showing 1 to 25 of total 3550 Controlled terms

Search :

- Date range
  2013 to 2020
- Sort by
  Count (descending)

Controlled term	Articles				Authors	Collaborating organisations	Global rank (Rank applicable from 2013 - 2020)
	Count	% Change 2013 - 2019	Times cited	Avg times cited			
roads	654	51.19%	529	0.81	1200	130	1 of 2988
wide band gap semiconductors	649	152.38%	950	1.46	903	112	1 of 5740

Inspec检索案例

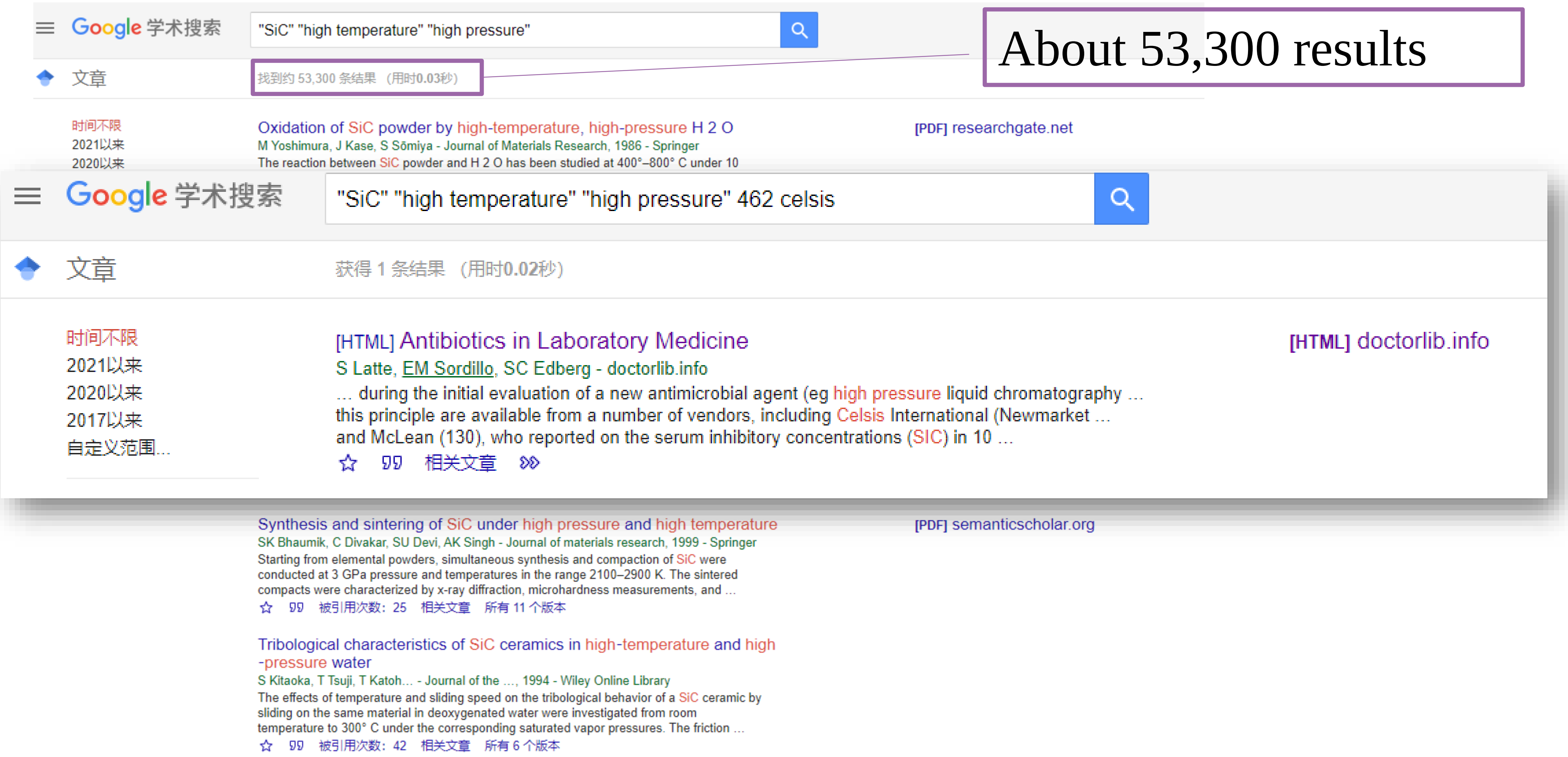
金星（Venus）—被遗忘的维纳斯

- 大气压力是地球的92倍
- 表面平均温度高达735 K（462 ° C）
- 太阳系中最热的行星

近期，天文学家简·格里维斯团队在《自然·天文学》发文称，他们在金星高空大气层中发现了生命活动的迹象，似乎有不明的生物在释放一种生命标志气体—**磷化氢**。

关键字检索

Key words: SiC+high temperature+high pressure



"SiC" "high temperature" "high pressure"

找到约 53,300 条结果 （用时0.03秒）

About 53,300 results

Oxidation of SiC powder by high-temperature, high-pressure H 2 O
M Yoshimura, J Kase, S Sōmiya - Journal of Materials Research, 1986 - Springer
The reaction between SiC powder and H 2 O has been studied at 400°–800° C under 10

[PDF] researchgate.net

"SiC" "high temperature" "high pressure" 462 celsis

获得 1 条结果 （用时0.02秒）

[HTML] Antibiotics in Laboratory Medicine
S Latte, EM Sordillo, SC Edberg - doctorlib.info
… during the initial evaluation of a new antimicrobial agent (eg high pressure liquid chromatography … this principle are available from a number of vendors, including Celsis International (Newmarket … and McLean (130), who reported on the serum inhibitory concentrations (SIC) in 10 …

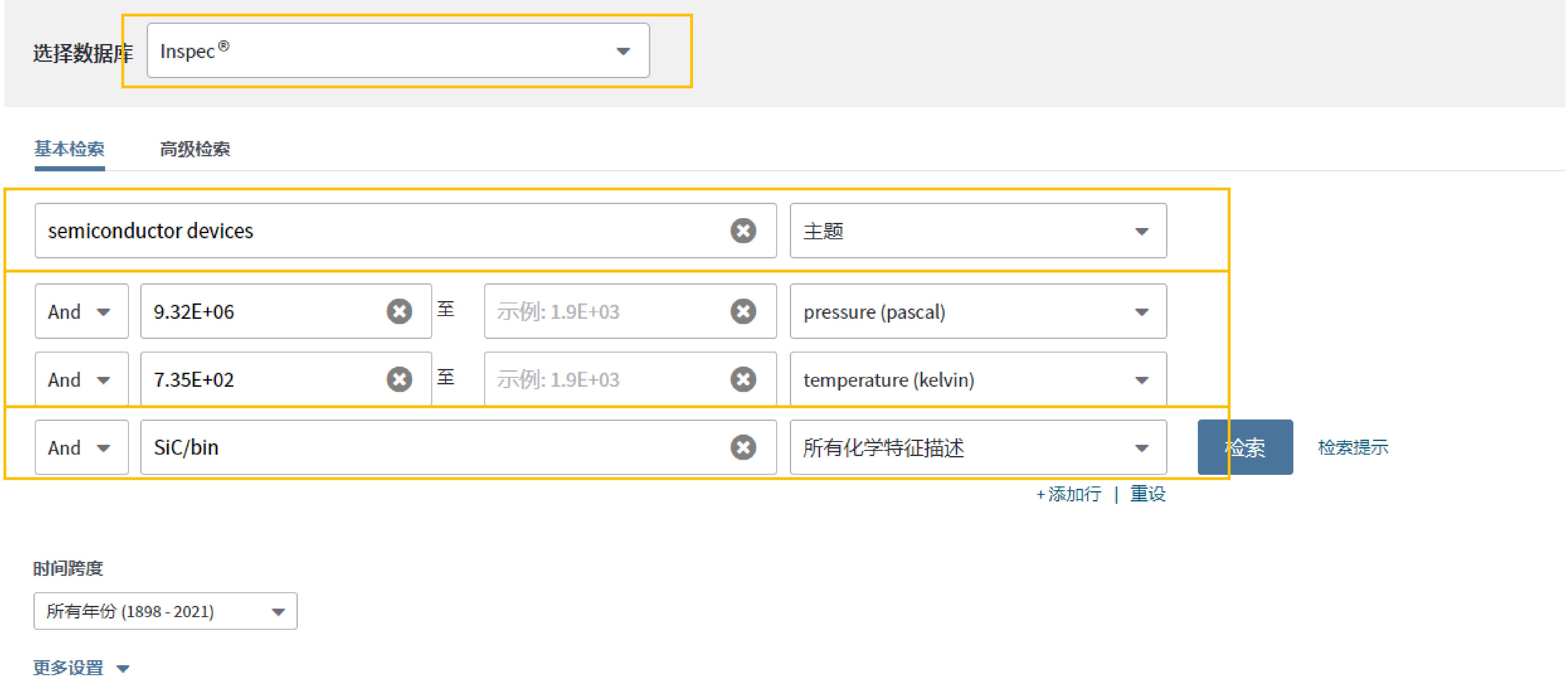
[HTML] doctorlib.info

Synthesis and sintering of SiC under high pressure and high temperature
SK Bhaumik, C Divakar, SU Devi, AK Singh - Journal of materials research, 1999 - Springer
Starting from elemental powders, simultaneous synthesis and compaction of SiC were conducted at 3 GPa pressure and temperatures in the range 2100–2900 K. The sintered compacts were characterized by x-ray diffraction, microhardness measurements, and …

[PDF] semanticscholar.org

Tribological characteristics of SiC ceramics in high-temperature and high-pressure water
S Kitaoka, T Tsuji, T Katoh... - Journal of the ..., 1994 - Wiley Online Library
The effects of temperature and sliding speed on the tribological behavior of a SiC ceramic by sliding on the same material in deoxygenated water were investigated from room temperature to 300° C under the corresponding saturated vapor pressures. The friction …

Inspec精准检索



选择数据库: Inspec®

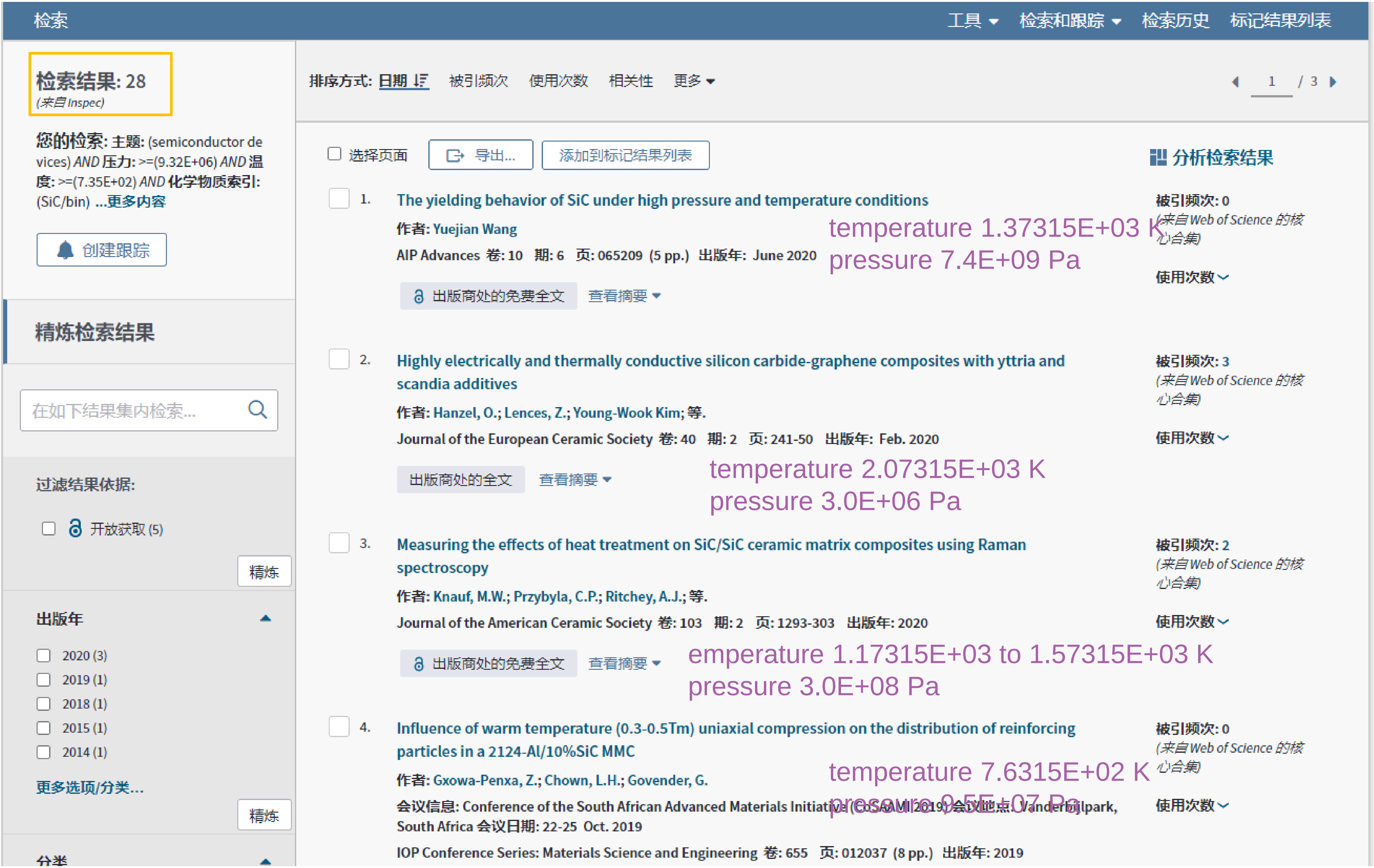
semiconductor devices — 主题

And 9.32E+06 至 示例: 1.9E+03 — pressure (pascal)

And 7.35E+02 至 示例: 1.9E+03 — temperature (kelvin)

And SiC/bin — 所有化学特征描述

时间跨度: 所有年份 (1898 - 2021)



检索结果: 28
(来自 Inspec)

您的检索: **主题:** (semiconductor devices) *AND* **压力:** >=(9.32E+06) *AND* **温度:** >=(7.35E+02) *AND* **化学物质索引:** (SiC/bin) ...更多内容

过滤结果依据:

☐ 开放获取 (5)

出版年

☐ 2020 (3)
☐ 2019 (1)
☐ 2018 (1)
☐ 2015 (1)
☐ 2014 (1)

☐ 1. **The yielding behavior of SiC under high pressure and temperature conditions**
作者: Yuejian Wang
AIP Advances 卷: 10 期: 6 页: 065209 (5 pp.) 出版年: June 2020
出版商处的免费全文 查看摘要
被引频次: 0 *(来自 Web of Science 的核心合集)*
使用次数

temperature 1.37315E+03 K
pressure 7.4E+09 Pa

☐ 2. **Highly electrically and thermally conductive silicon carbide-graphene composites with yttria and scandia additives**
作者: Hanzel, O.; Lences, Z.; Young-Wook Kim; 等.
Journal of the European Ceramic Society 卷: 40 期: 2 页: 241-50 出版年: Feb. 2020
出版商处的全文 查看摘要
被引频次: 3 *(来自 Web of Science 的核心合集)*
使用次数

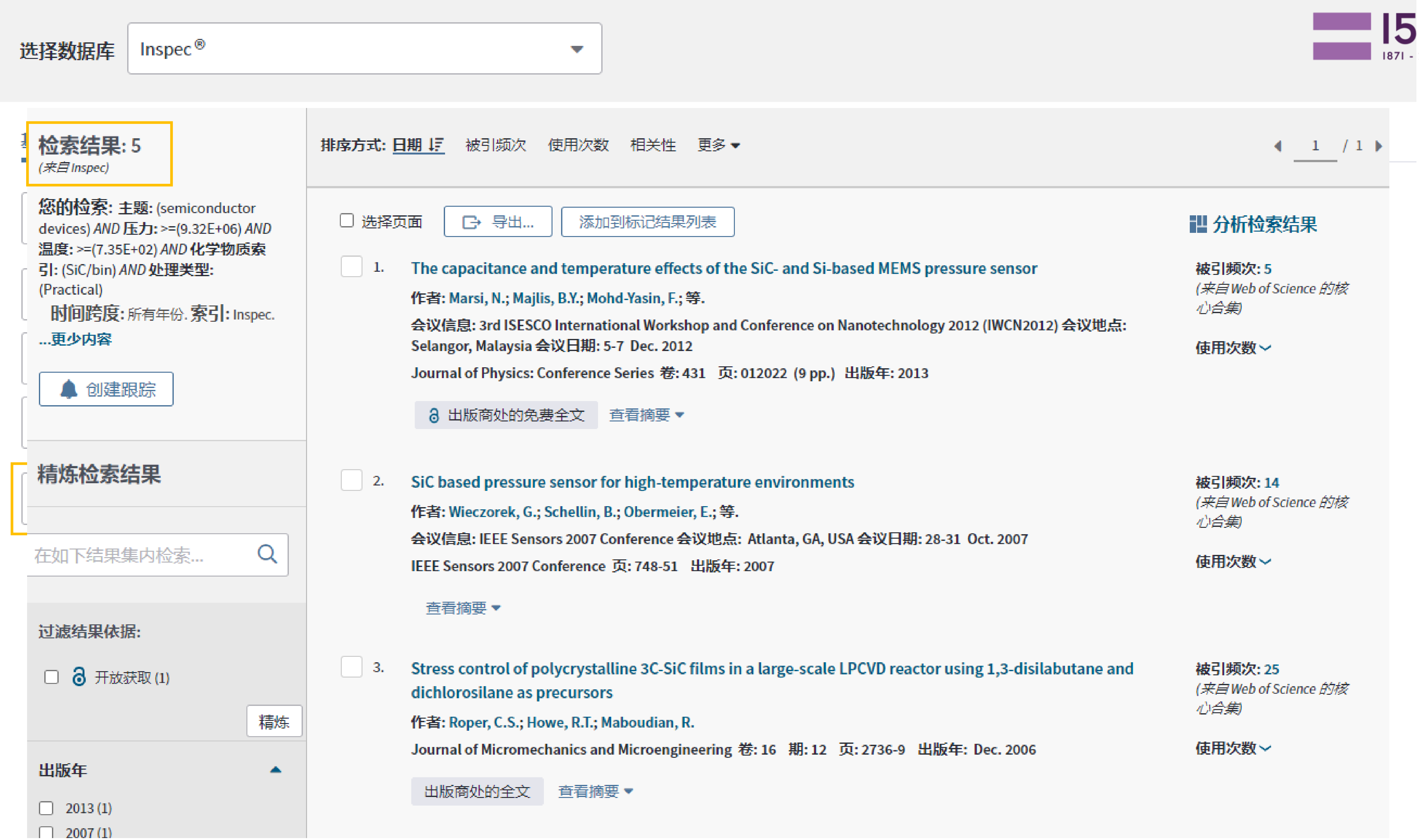
temperature 2.07315E+03 K
pressure 3.0E+06 Pa

☐ 3. **Measuring the effects of heat treatment on SiC/SiC ceramic matrix composites using Raman spectroscopy**
作者: Knauf, M.W.; Przybyla, C.P.; Ritchey, A.J.; 等.
Journal of the American Ceramic Society 卷: 103 期: 2 页: 1293-303 出版年: 2020
出版商处的免费全文 查看摘要
被引频次: 2 *(来自 Web of Science 的核心合集)*
使用次数

emperature 1.17315E+03 to 1.57315E+03 K
pressure 3.0E+08 Pa

☐ 4. **Influence of warm temperature (0.3-0.5Tm) uniaxial compression on the distribution of reinforcing particles in a 2124-Al/10%SiC MMC**
作者: Gxowa-Penxa, Z.; Chown, L.H.; Govender, G.
会议信息: Conference of the South African Advanced Materials Initiative (CoSAAMI 2019) 会议地点: Vanderbijlpark, South Africa 会议日期: 22-25 Oct. 2019
IOP Conference Series: Materials Science and Engineering 卷: 655 页: 012037 (8 pp.) 出版年: 2019
被引频次: 0 *(来自 Web of Science 的核心合集)*
使用次数

temperature 7.6315E+02 K
pressure 9.5E+07 Pa



选择数据库 Inspec®

检索结果: 5
(来自 Inspec)

您的检索: 主题: (semiconductor devices) *AND* **压力:** >=(9.32E+06) *AND* **温度:** >=(7.35E+02) *AND* **化学物质索引:** (SiC/bin) *AND* **处理类型:** (Practical)
时间跨度: 所有年份. **索引:** Inspec.
...更少内容

创建跟踪

精炼检索结果

在如下结果集内检索...

过滤结果依据:

☐ 开放获取 (1)

精炼

出版年

☐ 2013 (1)
☐ 2007 (1)

排序方式: 日期 被引频次 使用次数 相关性 更多

1 / 1

☐ 选择页面 导出... 添加到标记结果列表

分析检索结果

☐ 1. The capacitance and temperature effects of the SiC- and Si-based MEMS pressure sensor

作者: Marsi, N.; Majlis, B.Y.; Mohd-Yasin, F.; 等.

会议信息: 3rd ISESCO International Workshop and Conference on Nanotechnology 2012 (IWCN2012) **会议地点:** Selangor, Malaysia **会议日期:** 5-7 Dec. 2012

Journal of Physics: Conference Series **卷:** 431 **页:** 012022 (9 pp.) **出版年:** 2013

出版商处的免费全文 查看摘要

被引频次: 5
(来自 Web of Science 的核心合集)
使用次数

☐ 2. SiC based pressure sensor for high-temperature environments

作者: Wieczorek, G.; Schellin, B.; Obermeier, E.; 等.

会议信息: IEEE Sensors 2007 Conference **会议地点:** Atlanta, GA, USA **会议日期:** 28-31 Oct. 2007

IEEE Sensors 2007 Conference **页:** 748-51 **出版年:** 2007

查看摘要

被引频次: 14
(来自 Web of Science 的核心合集)
使用次数

☐ 3. Stress control of polycrystalline 3C-SiC films in a large-scale LPCVD reactor using 1,3-disilabutane and dichlorosilane as precursors

作者: Roper, C.S.; Howe, R.T.; Maboudian, R.

Journal of Micromechanics and Microengineering **卷:** 16 **期:** 12 **页:** 2736-9 **出版年:** Dec. 2006

出版商处的全文 查看摘要

被引频次: 25
(来自 Web of Science 的核心合集)
使用次数

十四五时期数字资源开发与利用研讨会
暨CALIS第十九届引进数据库培训周

单位：CALIS管理中心 D
承办单位：陕西师范大学
202 13日至14
西安

十四五时期数字资源开发与利用
暨CALIS第十九届引进数据库培训

07-5 文摘索引数据库：目次检索量（TOP24）

DRAA

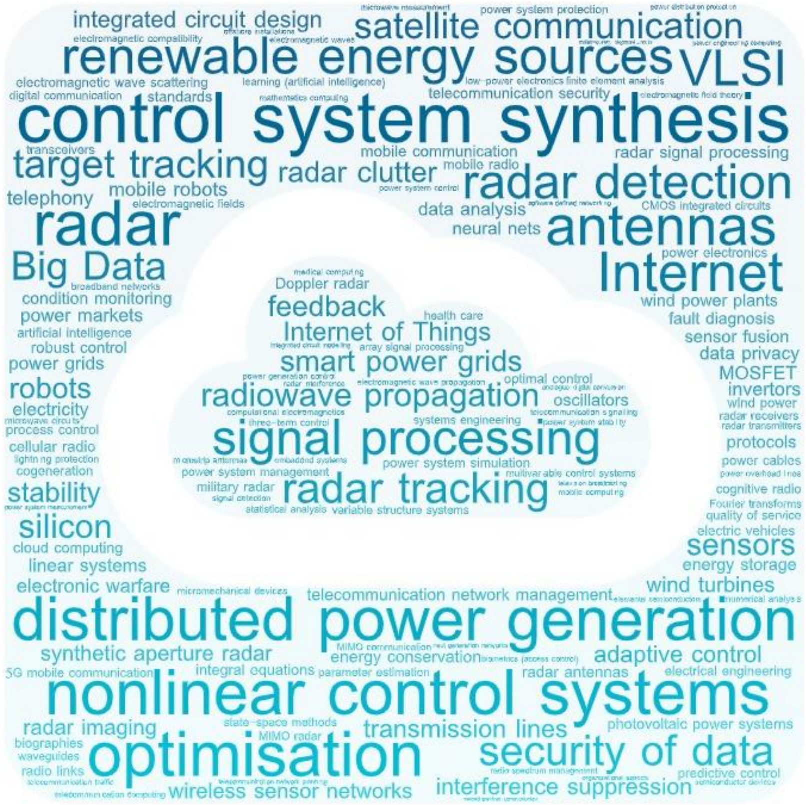
序号	数据库	2020	2019	涨幅	序号	数据库	2020	2019	涨幅
1	Inspec	1337555	649139	106.05%	14	SciFinder	98608	107951	-8.65%
2	BIOSIS Citation Index	899494	724513	24.15%	15	Scopus	66680	71427	-6.65%
3	Derwent Innovations Index	882706	798842	10.50%	16	Essential Science Indicators	60456	73064	-17.26%
4	FSTA	774003	233365	231.67%	17	Engineering Village Compendex	47995	71542	-32.91%
5	CSCD中国科学引文索引	620857	548358	13.22%	18	InCites	37905	37753	0.40%
6	Biosis Previews	591546	514298	15.02%	19	EBSCO园林园艺索摘数据库	25513	33952	-24.86%
7	CPCI会议录引文索引	488843	425142	14.98%	20	PQDT A	11163	16717	-33.22%
8	Web of Science-SCIE	465970	448216	3.96%	21	PQDT B	9113	10996	-17.12%
9	Web of Science-A&HCI	386774	327998	17.92%	22	OCLC FirstSearch	4168	3727	11.83%
10	Web of Science-SSCI	221089	209479	5.54%	23	Thomson Innovation	1794	1652	8.60%
11	JCR Web	149127	196561	-24.13%	24	CAB Abstracts database	1178	2337	-49.59%
12	Reaxys	123273	114985	7.21%	25	AGRICOLA	731	1357	-46.13%
13	Inspec	1337555	649139	106.05%	26	SciFinder	98608	107951	-8.65%

IET电子图书

IET电子书最早可以追溯到1979年，截止目前，已经出版近700本高质量电子图书

主要包含电路、设备与系统，控制工程，电气技术，电磁场与电磁波，工程制造，技术管理，电力与能源，计算专业应用，雷达、声呐、导航和航空电子学，再生能源，通讯

IET digital library访问
https://digital-library.theiet.org/

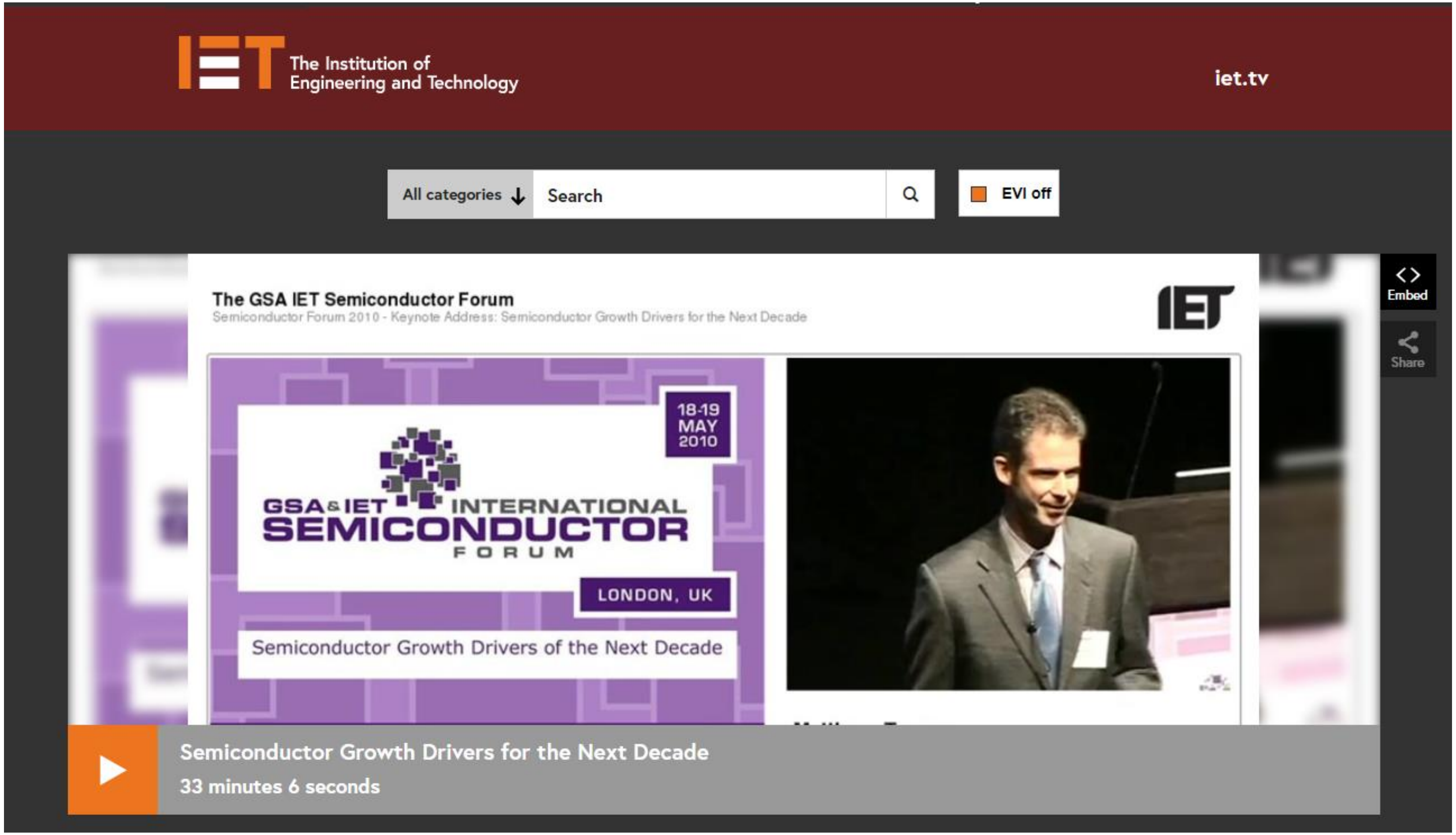


IET期刊

- 43种工程科技领域期刊
- 涵盖电子电气、计算机、控制、生物医药和通信技术各学科
- NSTL已购买IET Journal Archive 1872-1993,可申请通过IET digital library访问
- 2021年1月，金色OA出版模式转换，2013-2021已出版内容全部OA
- 已全部转入Wiley online library，IET专属界面

150
1871 - 2021

IET.TV



The GSA IET Semiconductor Forum
Semiconductor Forum 2010 - Keynote Address: Semiconductor Growth Drivers for the Next Decade

Semiconductor Growth Drivers of the Next Decade

Semiconductor Growth Drivers for the Next Decade
33 minutes 6 seconds

- 全球最大的工程科技领域视频库
- 目前拥有超过 13000 个视频资料
- 大会主题报告和研究热点访谈
- 内容涵盖工程、计算机、电信、能源、医疗、交通等学科
- 近一半的视频附带英文字幕，并可以对视频实现关键字检索定位


HAPPY
ANNIVERSARY
IET150
150
1871 - 2021
IET The Institution of Engineering and Technology

感谢关注！