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## STN Database Summary Sheet

**Derwent Biotechnology Resource (BIOTECHDS: Subscriber File; BIOTECHABS: Non-subscriber File)** covers the worldwide literature on all aspects of biotechnology, from genetic manipulation through biochemical engineering and fermentation to downstream processing. About 30% of the database cites patent publications. In addition to bibliographic information records contain Derwent's abstract and controlled term indexing.

For file crossover to WPIDS, WPIX, or WPINDEX; the Derwent Accession Number is available in all BIOTECHABS patent records.

### Subject Coverage

- Agriculture
- Biocatalysis
- Biochemical Engineering
- Bioinformatics methodologies, databases, hardware, and software
- Cell Culture
- Chemistry: Physicochemical and Biological Assays relevant to
- Biotechnological Processes
- Downstream Processing
- Food Additives and SCP
- Fuels produced by Fermentation or Similar Processes
- Genomics and proteomics, including pharmacogenomics, expression profiling, ESTs and SNPs, and high throughput screening
- Microbiology: Genetics and Fermentation
- Pharmaceuticals produced by Microorganisms and Enzymatic Synthesis
- Other Chemicals produced by Microorganisms and Enzymatic Synthesis
- Tissue culture and engineering products, processes and applications
- Waste Disposal

### Sources

- Conference contributions
- Journals
- Patents

### File Data

- 1982 to present
- More than 445,118 citations (7/08)
- Updated weekly
- Automatic current-awareness searches (SDIs) may be run weekly or every 2 weeks (every two weeks is the default)

### User Aides

- BIOTECHABS/BIOTECHDS Database Description
- Derwent Biotechnology Resource Introduction (available from the producer)
- Derwent Biotechnology Resource User Guide (available from the producer)
- Online Helps (HELP DIRECTORY lists all help messages available)
- STNGUIDE

### Database Producer/Supplier

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#### In Japan

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customer@jaici.or.jp (Customer Service)  
Internet: www.jaici.or.jp

**BIOTECHABS****Search and Display Field Codes**

There are no fields that allow left truncation in this file.

| Search Field Name   | Search Code      | Search Examples  | Display Codes        |
|---|------------------|--|----------------------|
| Basic Index (contains single words from TI, AB and CT, and enzyme commission numbers) | None<br>(or /BI) | S PRODUCTION OF CARBOCYCLIC NUCLEOSIDES<br>S EC-3.1.1.3<br>S LIPASE(L)CARBOXYLESTERASE | TI, AB, CT           |
| Accession Number  | /AN              | S 92-14434/AN<br>S 2002-00517/AN   | AN                   |
| Application Country   | /AC              | S EP/AC(S)1992/AY  | AI                   |
| Application Date (1)  | /AD              | S EP/AC(S)20 FEB 1992/AD   | AI                   |
| Application Number (2)  | /AP              | S 92EP-0250036/AP<br>S EP92-250036/AP  | AI                   |
| Application Year (1)  | /AY              | S 1991-1992/AY(S)FR/AC   | AI                   |
| Author (Inventor)   | /AU              | S BAINES B S/AU<br>S BAINES, B S/AU  | AU                   |
| Classification Code<br>(code and/or text)   | /CC<br>(/CCEN)   | S K/CC AND GLAXO/CS<br>S K2/CC AND EP/PC   | CC                   |
| Controlled Term (3)   | /CT              | S SOIL DECONTAMINATION/CT  | CT                   |
| Corporate Source Patent<br>Assignee (3)   | /CS              | S GRANADA-GENET?/CS<br>S "GRANADA-GENET."/CS   | CS, PA               |
| Document Type<br>(code and text)  | /DT              | S K/CC AND P/DT<br>S JOURNAL/DT AND SOIL DECONTAMINATION/CT                            | DT                   |
| Entry Date (1)  | /ED<br>(/UP)     | S JAN 2002<ED<MAR 2002   | Not displayed        |
| Enzyme Commission Number<br>International (Standard)<br>Document Number               | /EC<br>/ISN      | S EC-3.1.1.3/EC AND US/PC<br>S EMTED2/ISN<br>S 0141-0229/ISN                           | AB, CT, EC, TI<br>SO |
| Inventor  | /IN              | S ADAMS J?/IN  | AU                   |
| Journal Title   | /JT              | S DNA CELL BIOL./JT  | JT, SO               |
| Language (code and text)  | /LA              | S DE/LA AND L10<br>S L7 AND ENGLISH/LA   | LA                   |
| Location (4)  | /LO              | S GLAXO RESEARCH/LO  | LO                   |
| Other Source (5)  | /OS              | S 92-333672/OS   | OS                   |
| Patent Assignee (3)   | /PA              | S PREUSSAG/PA<br>S PROTEIN-DESIGN-LABS/PA  | PA                   |
| Patent Country  | /PC              | S EP/PC (S) 2001/PY<br>S UNITED KINGDOM/PC   | PI                   |
| Patent Number (2)   | /PN              | S EP-507421/PN<br>S EP507421/PN<br>S EP0507421/PN                                      | PI                   |
| Priority Country  | /PRC             | S BE/PRC(S)1991/PRY<br>S UNITED STATES/PRC   | PRAI                 |
| Priority Date (1)   | /PRD             | S 18 FEB 1991/PRD  | PRAI                 |
| Priority Date, First (1)  | /PRDF            | S MARCH 1992/PRDF(S)JP/PRC   | PRAI                 |
| Priority Number (2)   | /PRN             | S 1991EP-0200379/PRN<br>S EP1991-200379/PRN  | PRAI                 |
| Priority Year (1)   | /PRY             | S 1990-1991/PRY  | PRAI                 |
| Priority Year, First (1)  | /PRYF            | S 1990-1991/PRYF(S)BE/PRC  | PRAI                 |
| Publication Date (1)  | /PD              | S 8 AUG 2001/PD (S) EP/PC  | PI                   |
| Publication Year  | /PY              | S 2000-2001/PY (L) EMTED2/SO   | PI, PY, SO           |
| Source (contains journal title,<br>CODEN, collation and meeting<br>information)       | /SO              | S ENZYME MICROB/SO<br>S (DECHEMA(S)CONF?)/SO   | SO                   |
| Title   | /TI              | S DECONTAMINATION OF SOIL/TI   | TI                   |

(1) Numeric search field that may be searched using numeric operators or ranges.

(2) Numbers are searchable in DERWENT and STN format.

(3) Search with implied (S) proximity is available in this field.

(4) Search with implied (L) proximity is available in this field.

(5) Contains the WPIDS/WPINDEX accession number.

## DISPLAY and PRINT Formats

Any combination of formats may be used to display or print answers. Multiple codes must be separated by commas or spaces, e.g., D L1 1-5 PA TI. The fields are displayed or printed in the order requested.

Hit-term highlighting is for all fields except EC, ADT, FDT. Highlighting must be ON during SEARCH in order to use the HIT, KWIC, and OCC formats.

| Format   | Content  | Examples  |
|--|--|---|
| AB<br>AI (AP) (1)<br>AN (2)<br>AU<br>CC (CCEN) (2)<br>CS<br>CT (2)<br>DT (TC) (2)<br>EC (3)<br>ISN (3)<br>JT(3)<br>LA (2)<br>LO<br>LS (3)<br>LS2 (3)<br>OS (2)<br>PA (CS)<br>PI (PN) (1)<br>PRAI (PRN) (1)<br>PY (2)<br>SO<br>TI (2) | Abstract<br>Application Information<br>Accession Number<br>Author (Inventor)<br>Classification Code<br>Corporate Source<br>Controlled Term<br>Document Type<br>Enzyme Commission Number<br>International Standard (Document) Number (CODEN and ISSN)<br>Journal Title<br>Language<br>Location<br>Legal Status (from the INPADOC database)<br>Legal Status (from the INPADOC database), detailed version with display headers<br>Other Source<br>Patent Assignee<br>Patent Information<br>Priority Information<br>Publication Year<br>Source<br>Title | D TI PA AB<br>D AI PI<br>D AN<br>D TI AU<br>D CC<br>D AU CS<br>D CT<br>D DT<br>D EC<br>D ISN<br>D JT<br>D LA<br>D LO<br>D LS<br>D LS2<br>D OS<br>D PA<br>D PI PRAI<br>D PRAI<br>D PY<br>D SO<br>D TI CT |
| ABS<br>ALL<br>BIB<br>CBIB<br>DALL<br>FAM (1)<br>IALL<br>IBIB<br>IND (2)<br>TRIAL (TRI, SAM) (2)  | AN, AB<br>AN, TI, AU, CS, PA, LO, SO, PI, AI, PRAI, DT, LA, OS, AB, CC, CT<br>AN, TI, AU, CS, PA, LO, SO, PI, AI, PRAI, DT, LA, OS (BIB is the default)<br>AN, compressed bibliography<br>ALL, delimited for post-processing<br>Family Information from the Derwent World Patents Index (PI, ADT, FDT, PRAI)<br>ALL, but indented with text labels<br>BIB, but indented with text labels<br>AN, CT, CC<br>AN, TI, CC, CT   | D ABS<br>D ALL<br>D<br>D CBIB<br>D DALL<br>D FAM<br>D IALL<br>D IBIB 1-3<br>D L3 IND<br>D TRI TOTAL   |
| HIT<br>KWIC<br>OCC (2)   | Fields containing hit terms<br>Hit terms with 20 words on either side (KeyWord-In-Context)<br>Number of occurrences of hit terms and fields in which they occur  | D HIT<br>D KWIC NOH<br>D OCC  |

(1) Application, priority and patent numbers are available in DERWENT and STN format. The format for DISPLAY, PRINT, SELECT and SORT is controlled by the Messenger SET PATENT command. The STN format is default. SET PAT DERWENT changes (permanently) to the DERWENT format. To change to the STN format again, enter SET PAT STN.

(2) No online display fee for this format.

(3) Custom display only.

## BIOTECHABS

### Controlled Term (/CT) Thesaurus

All relationship codes can be used with both the SEARCH and EXPAND commands in the Controlled Term (/CT) field.

| Code     | Content   | Example             |
|----------|---|---------------------|
| ALL      | All Associated Terms (BT, SELF, USE, UF, EXA, TNA, SNA, EC, RT, OLD, NEW, NT, KT) | E FUNGICIDE+ALL/CT  |
| AUTO (1) | Automatic Relationship (SELF, USE, UF, OLD, NEW, TNA, SNA, EC)                    | S FERMENTER+AUTO/CT |
| BT       | Broader Terms (BT, SELF)  | E BENOMYL+BT/CT     |
| HIE      | Hierarchy Terms (Broader and Narrower Terms) (BT, SELF, NT)                       | E PROTEASE+HIE/CT   |
| KT       | Keyword Terms (KT, SELF)  | E ENZYME+KT/CT      |
| NT       | Narrower Terms (SELF, NT)   | S FUNGICIDE+NT/CT   |
| RT       | Related Terms (SELF, RT)  | E PESTICIDE+RT/CT   |
| STD      | Standard Terms (BT, SELF, NT, RT)   | E DINOSEB+STD/CT    |
| USE      | Preferred Terms (SELF, USE)   | S FERMENTER+USE/CT  |

(1) Automatic Relationship is SET OFF. When SET REL is ON, the result of EXPAND or SEARCH without any relationship code is the same as described for AUTO.

### SELECT, ANALYZE, and SORT Fields

The SELECT command is used to create E-numbers or an L-number containing terms taken from the specified field in an answer set.

The ANALYZE command is used to create an L-number containing terms taken from the specified field in an answer set.

The SORT command is used to rearrange the search results in either alphabetic or numeric order of the specified field(s).

| Field Name                               | Field Code | ANALYZE/<br>SELECT (1) | SORT |
|--|------------|------------------------|------|
| Abstract                                 | AB         | Y (2)                  | N    |
| Accession Number                         | AN         | Y                      | N    |
| Application Country                      | AC         | Y                      | Y    |
| Application Date                         | AD         | Y                      | Y    |
| Application Information (3)              | AI         | Y (4)                  | Y    |
| Application Number (3)                   | AP         | Y                      | Y    |
| Application Year                         | AY         | Y                      | Y    |
| Author                                   | AU         | Y                      | Y    |
| Classification Code                      | CC         | Y                      | Y    |
|  | CCEN       | Y (5)                  | Y    |
| CODEN                                    | CODEN      | N                      | Y    |
| Controlled Term                          | CT         | Y                      | N    |
| Corporate Source                         | CS         | Y                      | Y    |
| Document Type                            | DT         | Y                      | Y    |
| Enzyme Commission Number                 | EC         | Y (6)                  | Y    |
| International Standard (Document) Number | ISN        | Y (7)                  | Y    |
| International Standard Serial Number     | ISSN       | N                      | Y    |
| Inventor                                 | IN         | Y (8)                  | Y    |
| Journal Title                            | JT         | Y                      | Y    |
| Language                                 | LA         | Y                      | Y    |
| Location                                 | LO         | Y                      | Y    |
| Other Source                             | OS         | Y                      | Y    |
| Patent Assignee                          | PA         | Y                      | Y    |
| Patent Country                           | PC         | Y                      | Y    |
| Patent Date                              | PD         | Y                      | Y    |

**SELECT, ANALYZE, and SORT Fields (cont'd)**

| Field Name               | Field Code | ANALYZE/<br>SELECT (1) | SORT |
|--------------------------|------------|------------------------|------|
| Patent Information (3)   | PI         | Y (9)                  | Y    |
| Patent Number (3)        | PN         | Y                      | Y    |
| Priority Country         | PRC        | Y                      | Y    |
| Priority Information (3) | PRAI       | Y (10)                 | Y    |
| Priority Date            | PRD        | Y                      | Y    |
| Priority Date, First     | PRDF       | Y                      | Y    |
| Priority Number (3)      | PRN        | Y                      | Y    |
| Priority Year            | PRY        | Y                      | Y    |
| Priority Year, First     | PRYF       | Y                      | Y    |
| Publication Year         | PY         | Y                      | Y    |
| Source                   | SO         | Y (11)                 | Y    |
| Title                    | TI         | Y (default)            | Y    |
| Treatment Code           | TC         | Y (12)                 | Y    |

- (1) HIT may be used to restrict terms extracted to terms that match the search expression used to create the answer set, e.g., SEL HIT AU.
- (2) Appends /BI to the terms created by SELECT.
- (3) SELECTed, ANALYZEd, and SORTed application, priority and patent numbers are in the format set by the SET PATENT command, either DERWENT or STN.
- (4) Selects or analyzes application number with /AP appended to the terms created by SELECT.
- (5) Appends /CC to the terms created by SELECT.
- (6) SELECT HIT and ANALYZE HIT are not valid with this field.
- (7) Selects or analyzes CODEN and ISSN with /ISN appended to the terms created by SELECT.
- (8) Appends /AU to the terms created by SELECT.
- (9) Selects or analyzes patent number with /PN appended to the terms created by SELECT.
- (10) Selects or analyzes priority number with /PRN appended to the terms created by SELECT.
- (11) Select or analyzes ISSN and CODEN with /SO appended to the terms created by SELECT.
- (12) Appends /DT to the terms created by SELECT

**BIOTECHABS****Sample Records****DISPLAY IALL**

ACCESSION NUMBER: 2002-00370 BIOTECHABS  
TITLE: DNA-support coupling for transcription factor purification.  
Comparison of aldehyde, cyanogen bromide and  
N-hydroxysuccinimide chemistries;  
transcription factor-IIIA purification by affinity  
chromatography  
AUTHOR: Chockalingam P S; Gadgil H; \*Jarrett H W  
CORPORATE SOURCE: Univ.Tennessee  
LOCATION: Department of Biochemistry, University of Tennessee, 858  
Madison Avenue, Memphis, TN 38163, USA.  
Email: hjarrett@utmem.edu  
SOURCE: J.Chromatogr.; ( \*\*\*2002\*\*\* ) 942, 1-2, 167-75  
CODEN: JOCRAM  
ISSN: 0021-9673  
DOCUMENT TYPE: Journal  
LANGUAGE: English  
ABSTRACT: Transcription factor-IIIA was purified on internal control  
region DNA coupled to aldehyde-silica, and results were  
compared with those obtained CNBr-activated Sepharose and  
Bio-Rad Affi-Gel 10. Affi-Gel provides mixed-mode  
chromatography, with both ionexchange and affinity modes.  
Coupling DNA to aldehyde-silica is advantageous in that it  
has no ionexchange properties and performed as well as DNA  
coupled to CNBr-activated Sepharose. Purification of lac  
repressor on aldehyde-silica, and CAAT enhancer binding  
protein on Affi-Gel also showed the advantages of a neutral  
adsorbent and the disadvantages of mixed-mode chromatography  
for transcription factor purification. Aldehyde-silica  
couples to alkylamines and to the amines of adenine,  
guanosine and cytosine nucleoside bases. Reaction occurs  
with single- and (less efficiently) double-stranded DNA.  
Affinity adsorbents based on stable aldehyde chemistry  
display high specificity and combine high binding and loading  
capacity with good reproducibility. Since CNBr chemistry has  
not yet been applied to silica adsorbents, aldehyde-silica  
coupling is currently the most attractive method for DNA  
affinity HPLC. (21 ref)  
CLASSIFICATION: THERAPEUTICS, Protein Therapeutics; BIOMANUFACTURING AND  
BIOCATALYSIS, Downstream Processing  
CONTROLLED TERMS: TRANSCRIPTION FACTOR-IIIA PURIFICATION, AFFINITY  
CHROMATOGRAPHY, HPLC, DNA-ALDEHYDE SILICA ADSORBENT PROTEIN  
PURIFICATION (VOL.21, NO.1)

## DISPLAY ALL FAM

AN 2002-00518 BIOTECHABS  
 TI In vitro modification of cardiac valvular xenografts; pig heart valve xenograft, tissue engineering and transplantation in human for graft-versus-host disease and inflammation therapy  
 AU Chen R H; Adams D H  
 PA Brigham+Women's-Hosp.Boston  
 LO Boston, MA, USA.  
 PI WO 2001064847 7 Sep 2001  
 AI WO 2001-US6240 28 Feb 2001  
 PRAI US 2000-185747 29 Feb 2000  
 DT Patent  
 LA English  
 OS WPI: 2001-514839 [56]  
 AB A new method (M1) of preparing a heart valve for transplantation into a patient is new and involves removing the heart valve from a donor animal, culturing the heart valve in vitro for a period of time sufficient to reduce antigens inducing inflammation upon transplantation, and implanting the cultured heart valve into the patient. Also claimed are: a heart valve produced by M1; a heart valve obtained from a donor animal (e.g. pig) for transplantation into a human, where the heart valve expresses less than 10%, preferably less than 1%, of the major histocompatibility complex class-II antigens normally found in the valve immediately after removal from the donor animal; and preserving a heart valve for transplantation into a patient involves surgically removing the heart valve from a donor animal and preserving it by freezing or chemical treatment, the improvement involves incubating the heart valve in vitro for a period of time sufficient to reduce antigens inducing inflammation upon transplantation. The method is useful for obtaining heart valves that have a reduced tendency to cause inflammation upon transplantation into a human patient. (8pp)  
 CC THERAPEUTICS, Tissue Culture/Engineering; DISEASE, Cardiovascular System  
 CT PIG HEART VALVE XENOGRAFT, TISSUE ENGINEERING, XENOTRANSPLANTATION IN HUMAN, APPL. GRAFT-VERSUS-HOST DISEASE, INFLAMMATION THERAPY MAMMAL ANIMAL TISSUE CULTURE TRANSPLANTATION (VOL.21, NO.1)  
 PI WO 2001064847 A2 20010907 (200156)\* EN 8p C12N005-06  
 RW: AT BE CH CY DE DK ES FI FR GB GR IE IT LU MC NL PT SE TR  
 W: CA JP  
 US 2001032015 A1 20011018 (200166) A61F002-24  
 ADT WO 2001064847 A2 WO 2001-US6240 20010228; US 2001032015 A1 Provisional US 2000-185747P 20000229, US 2001-793400 20010227  
 PRAI US 2000-185747P 20000229; US 2001-793400 20010227

**BIOTECHABS****EXPAND in CT Thesaurus**

=&gt; E FUNGICIDE+ALL/CT

|       |       |       |                         |
|-------|-------|-------|-------------------------|
| E1    | 11792 | BT1   | ANTIBIOTIC/CT           |
| E2    | 373   | BT2   | AGRICULTURE/CT          |
| E3    | 5985  | BT1   | pesticide/CT            |
| E4    | 2781  | -->   | FUNGICIDE/CT            |
| E5    | 11    | UF    | antifungal/CT           |
| E6    | 34    | UF    | antimicrobial/CT        |
| E7    | 0     | UF    | antimycotic/CT          |
| E8    | 1     | UF    | fungistatic/CT          |
| E9    | 21    | NT1   | AMPHOTERICIN/CT         |
| E10   | 12    | NT1   | AZASERINE/CT            |
| E11   | 8     | NT1   | BAFILOMYCIN/CT          |
| E12   | 46    | NT1   | BENOMYL/CT              |
| E13   | 9     | NT1   | BLASTICIDIN-S/CT        |
| E14   | 3     | NT1   | BUTALACTIN/CT           |
| E15   | 2     | NT1   | DAPIRAMYCIN/CT          |
| E16   | 1     | NT1   | DEHYDROIVAXILLIN/CT     |
| E17   | 15    | NT1   | DINOSEB/CT              |
| E18   | 13    | NT1   | EMODIN/CT               |
| E19   | 12    | NT1   | GRISEOFULVIN/CT         |
| E20   | 40    | NT1   | ITURIN/CT               |
| E21   | 3     | NT1   | LYDICAMYCIN/CT          |
| E22   | 5     | NT1   | METALAXYL/CT            |
| E23   | 67    | NT1   | NIKKOMYCIN/CT           |
| E24   | 1     | NT1   | NITROSO FUNGIN/CT       |
| E25   | 36    | NT1   | NYSTATIN/CT             |
| E26   | 25    | NT1   | OLIGOMYCIN/CT           |
| E27   | 389   | NT1   | PENTACHLOROPHENOL/CT    |
| E28   | 12    | NT1   | SINEFUNGIN/CT           |
| E29   | 0     | NT1   | VIRIDOFULVIN/CT         |
| E30   | 0     | KT    | FUNGICIDE RESISTANCE/CT |
| ***** | END   | ***** |                         |