

The National Classification Table (TLS210_APPLN_N_CLS)

Welcome to table TLS210_APPLN_N_CLS in PATSTAT, that is the National Classification Table. Some countries (GB, CH, CA, DE, FR, SE, ...) use national patent classification schemes beside the IPC. This table is a list of the national classifications linked to the respective national applications.

Coverage is weak: only a minority of applications in PATSTAT have a national class allotted.

```
In [1]: from epo.tipdata.patstat import PatstatClient

# Initialize the PATSTAT client
patstat = PatstatClient(env='PROD')

# Access ORM
db = patstat.orm()

# Importing the as models
from epo.tipdata.patstat.database.models import TLS210_APPLN_N_CLS
```

APPLN_ID

Let's use the unique identifier of each application to link this table to table TLS201.

```
In [2]: # Import table TLS201
from epo.tipdata.patstat.database.models import TLS201_APPLN

show_join = db.query(
    TLS201_APPLN.appln_id,
    TLS201_APPLN.appln_auth,
    TLS210_APPLN_N_CLS.nat_class_symbol
).join(
    TLS201_APPLN, TLS210_APPLN_N_CLS.appln_id == TLS201_APPLN.appln_id
).limit(1000)

show_join_df = patstat.df(show_join)
show_join_df
```

Out[2]:

	appln_id	appln_auth	nat_class_symbol
0	329924841	FR	1
1	19196044	FR	1
2	19210056	FR	1
3	19304671	FR	1
4	19318097	FR	1
...
995	23219553	GB	C6Y Y125
996	22792168	GB	C6Y Y134
997	43463470	WO	C6Y Y332
998	23182100	GB	C6Y Y501
999	22797097	GB	C7F6D1A1

1000 rows × 3 columns

NAT_CLASS_SYMBOL

This is classification symbol according to a national classification scheme. It consists of up to 15 characters.

These national classification symbols are stored exactly as received by the EPO. No corrections are made.

Let's see which applications authorities most commonly have a national symbol allotted.

```
In [16]: from sqlalchemy import func

nat_class_symb = db.query(
    func.count(TLS210_APPLN_N_CLS.nat_class_symbol).label('Number
of national symbols'),
    TLS201_APPLN.appln_auth
).join(
    TLS210_APPLN_N_CLS, TLS201_APPLN.appln_id == TLS210_APPLN_N_C
LS.appln_id
).group_by(
    TLS201_APPLN.appln_auth
).order_by(
    func.count(TLS210_APPLN_N_CLS.nat_class_symbol).desc()
)

nat_class_symb_df = patstat.df(nat_class_symb)
nat_class_symb_df
```

Out[16]:

	Number of national symbols	appln_auth
0	19212177	GB
1	1736356	DE
2	1198931	FR
3	739832	CH
4	709232	CA
5	650605	WO
6	566425	AT
7	262169	SE
8	223066	NL
9	184599	AU
10	172715	DK
11	112786	SU
12	75188	BE
13	64865	BR
14	62803	TW
15	22062	MX
16	21753	CS
17	13053	DD

18	11922	LU
19	6690	CL
20	4944	IE
21	1692	ES
22	1249	AP
23	1184	ZA
24	995	UY
25	777	EC
26	366	IT
27	312	GT
28	265	CR
29	90	OA
30	48	NO
31	5	YU
32	4	BG
33	3	HK
34	2	HU
35	2	IN
36	1	CN
37	1	US
38	1	AR

In []: