

# UCTE



## August 2003

Monthly provisional values  
union for the co-ordination of transmission of electricity

---

---

<b>Table of contents <sup>1</sup></b>		<b>Page</b>
1	Electricity supply situation of the countries	2
2	Physical energy flows	3
3	Monthly consumption	4
4	Monthly consumption variation	5
5	Consumption of last 12 months	6
6	Variation of the last 12 months' consumption	7
7	Load flows (night)	8
8	Load flows (day)	9
9	Unavailability of international tie lines ( major events )	10
10	Network reliability ( major events )	12
11	Scheduled exchanges	13
12	Load on the 3 <sup>rd</sup> Wednesday	14

<sup>1</sup> Monthly provisional values as of UCTE database from 05 December 2003

# 1

## Electricity supply situation of the countries

August 2003

Countries	Net production in GWh <sup>1</sup>				Exchange balance in GWh	Pump in GWh	Consumption in GWh <sup>1</sup>			
	Hy	Tn	Tc	Total			monthly	Δ <sup>3</sup> [%]	last 12 months	Δ <sup>3</sup> [%]
B	102	3820	2631	6553 <sup>2</sup>	-87	130	6336	-0,7	83959	1,5
D	1495	12397	26518	40410 <sup>2</sup>	-593	749	39068	3,4	506959	2,2
E	1825	5310	11865	19000 <sup>2</sup>	123	472	18651	12,6	218655	3,9
F	3573	30080	2949	36602	-4509	592	31501	4,8	443732	1,6
GR	416	0	3976	4392 <sup>2</sup>	229	77	4544	9,0	49104	2,6
I	3173	0	19284	22457	3021	832	24646	11,6	318737	3,3
SLO	172	362	273	807	160	0	967	4,9	12284	6,7
HR	179	0	704	883 <sup>2</sup>	373	9	1247	8,9	15160	1,6
BiH	192	0	563	755	15	0	770	n.a.	n.a.	n.a.
FYROM	76	0	381	457 <sup>2</sup>	2	0	459	n.a.	n.a.	n.a.
SCG	472	0	1970	2442	223	43	2622	n.a.	n.a.	n.a.
L	83	0	56	139	390	105	424	-0,2	6075	-0,5
NL	0	330	7261	7591 <sup>2</sup>	1388	0	8979	1,6	109740	3,8
A	2317	0	1096	3413	774	361	3826	5,1	51508	1,2
P	422	0	2611	3033 <sup>2</sup>	424	62	3395	9,4	42155	2,4
CH	3986	1193	222	5401 <sup>2</sup>	-615	361	4425	1,7	59049	2,8
CZ	116	1717	3866	5699 <sup>2</sup>	-1437	52	4210	3,3	59759	3,7
H	10	581	1809	2400 <sup>2</sup>	719	0	3119	8,1	38221	1,3
PL <sup>5</sup>	223	0	11064	11287 <sup>2</sup>	-739	215	10333	4,4	138176	1,1
SK	171	1278	649	2098 <sup>2</sup>	-139	31	1928	1,1	26363	5,1
<b>UCTE</b>	<b>19930</b>	<b>58797</b>	<b>104146</b>	<b>182873<sup>2</sup></b>	<b>-1087</b>	<b>4130</b>	<b>177656</b>	<b>5,9</b>	<b>2229274</b>	<b>1,1</b>
RO	721	347	2786	3854 <sup>2</sup>	-166	0	3688	n.a.	n.a.	n.a.
BG	206	1382	1612	3200 <sup>2</sup>	-643	39	2518	n.a.	n.a.	n.a.
West-UA	2	0	565	567 <sup>2</sup>	-303	0	264	n.a.	n.a.	n.a.

<sup>1</sup> Percentage as referred to total values in %

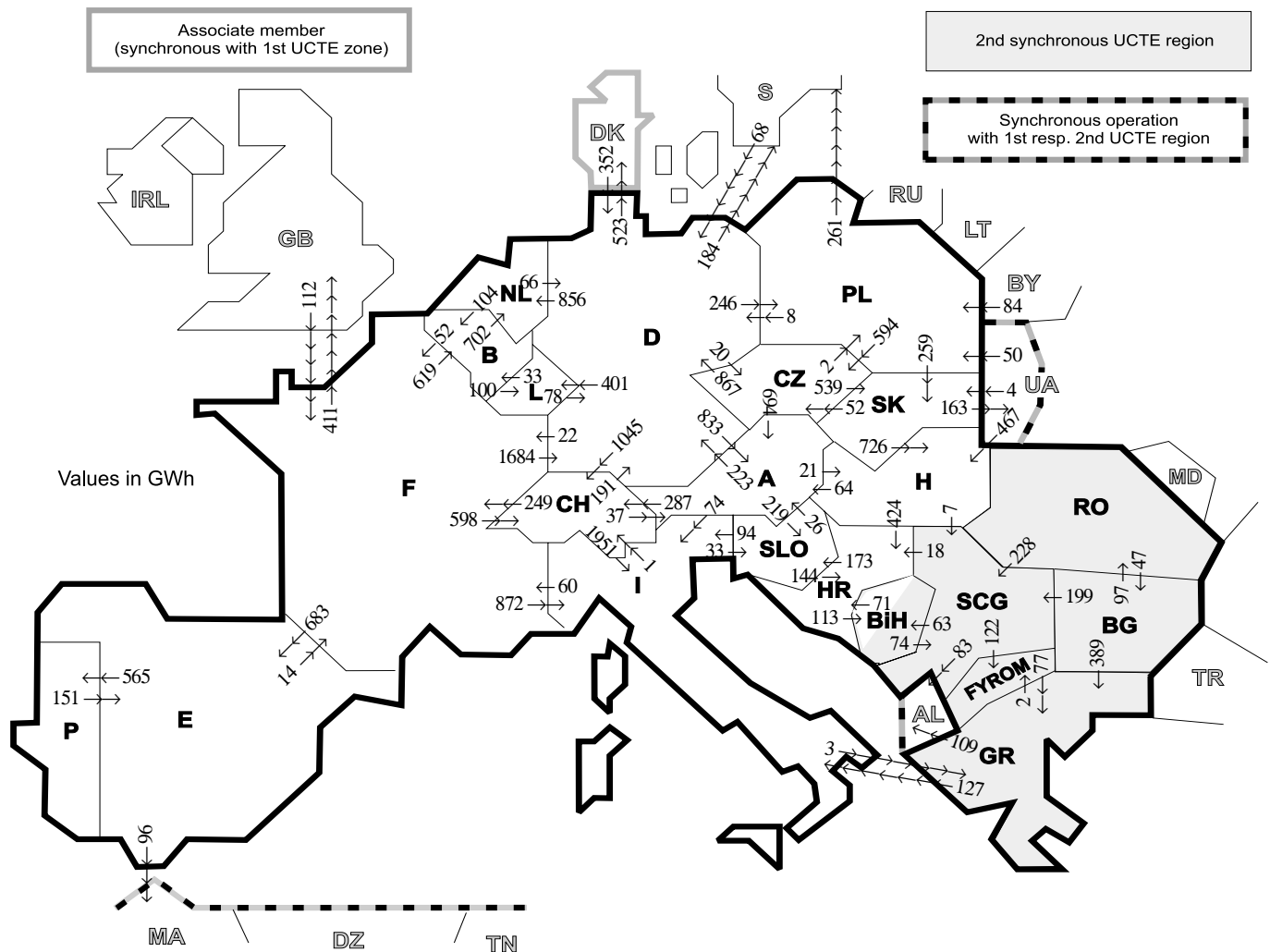
Countries	B	D	E	F	GR <sup>4</sup>	I	SLO	HR	BiH	FY- ROM	SCG	L	NL	A	P	CH	CZ	H	PL	SK	RO	BG	West- UA
Production	99	94	94	97	93	100	95	100	99	100	96	98	100	84	91	100	100	100	100	100	100	100	100
Consumption	99	94	94	97	93	100	95	100	99	100	96	99	100	90	91	100	100	100	100	100	100	100	100

<sup>2</sup> Including deliveries from industry

<sup>3</sup> Variation as compared to corresponding period of the previous year and representativity 100%

<sup>4</sup> The representativity of data referring to the whole country including the isolated systems of the Greek island is 93%.  
The representativity of data referring interconnected system on the mainland is 99%.

<sup>5</sup> Production values are gross values.



Exporting countries	Importing countries																			Σ Export							
	B	D	E	F	GR	I	SLO	HR	BIH	FY-ROM	SCG	L	NL	A	P	CH	CZ	H	PL		SK	RO	BG	West-UA	DK <sup>2</sup>	III <sup>1</sup>	
B	-	-	-	52	-	-	-	-	-	-	-	100	702	-	-	-	-	-	-	-	-	-	-	-	-	-	854
D	-	-	-	22	-	-	-	-	-	-	-	401	856	833	-	1045	20	-	246	-	-	-	-	-	523	707	4653
E	-	-	-	14	-	-	-	-	-	-	-	-	-	-	565	-	-	-	-	-	-	-	-	-	-	96	675
F	619	1684	683	-	-	872	-	-	-	-	-	-	-	-	-	598	-	-	-	-	-	-	-	-	-	411	4867
GR	-	-	-	-	-	127	-	-	-	2	-	-	-	-	-	-	-	-	-	-	-	-	0	-	-	109	238
I	-	-	-	60	3	-	33	-	-	-	-	-	-	0	-	1	-	-	-	-	-	-	-	-	-	-	97
SLO	-	-	-	-	-	94	-	-	-	-	-	-	-	26	-	-	-	-	-	-	-	-	-	-	-	-	264
HR	-	-	-	-	-	-	173	-	113	-	0	-	-	-	-	-	-	0	-	-	-	-	-	-	-	-	286
BIH	-	-	-	-	-	-	71	-	-	-	74	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	145
FYROM	-	-	-	-	77	-	-	-	-	-	0	-	-	-	-	-	-	-	-	-	-	0	-	-	-	-	77
SCG	-	-	-	-	-	-	-	18	63	122	-	-	-	-	-	-	-	-	0	-	-	0	0	-	-	83	286
L	33	78	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	111
NL	104	66	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	170
A	-	223	-	-	-	74	219	-	-	-	-	-	-	-	-	287	0	21	-	-	-	-	-	-	-	-	824
P	-	-	151	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	151
CH	-	191	-	249	-	1951	-	-	-	-	-	-	-	37	-	-	-	-	-	-	-	-	-	-	-	-	2428
CZ	-	867	-	-	-	-	-	-	-	-	-	-	-	694	-	-	-	-	2	539	-	-	-	-	-	-	2102
H	-	-	-	-	-	-	-	424	-	-	-	-	-	64	-	-	-	-	-	-	0	0	0	0	0	0	495
PL	-	8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	594	-	-	259	-	-	0	-	261	1122	
SK	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	52	726	0	-	-	-	163	163	1104	
RO	-	-	-	-	-	-	-	-	-	228	-	-	-	-	-	-	-	-	0	-	-	47	-	-	-	275	
BG	-	-	-	-	389	-	-	-	-	0	199	-	-	-	-	-	-	-	-	-	-	97	-	-	-	0	685
West-UA	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0
DK <sup>2</sup>	-	352	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	467	50	4	0	-	-	-	-	521
III <sup>1</sup>	-	68	0	112	0	-	-	-	-	-	0	-	-	-	-	-	-	467	134	4	0	0	-	-	-	-	785
Σ Import	756	3537	834	509	469	3118	425	657	176	124	508	501	1558	1654	565	1931	666	1214	382	802	97	47	163	523	1830	23567	

Sum of physical energy flows between UCTE countries = 19556 GWh

Total physical energy flows = 22360 GWh

<sup>1</sup> III = Third countries: Albania, Belarus, Denmark, Great Britain, Morocco, Republic of Moldavia, Sweden, Republic of Turkey and West-Ukraine

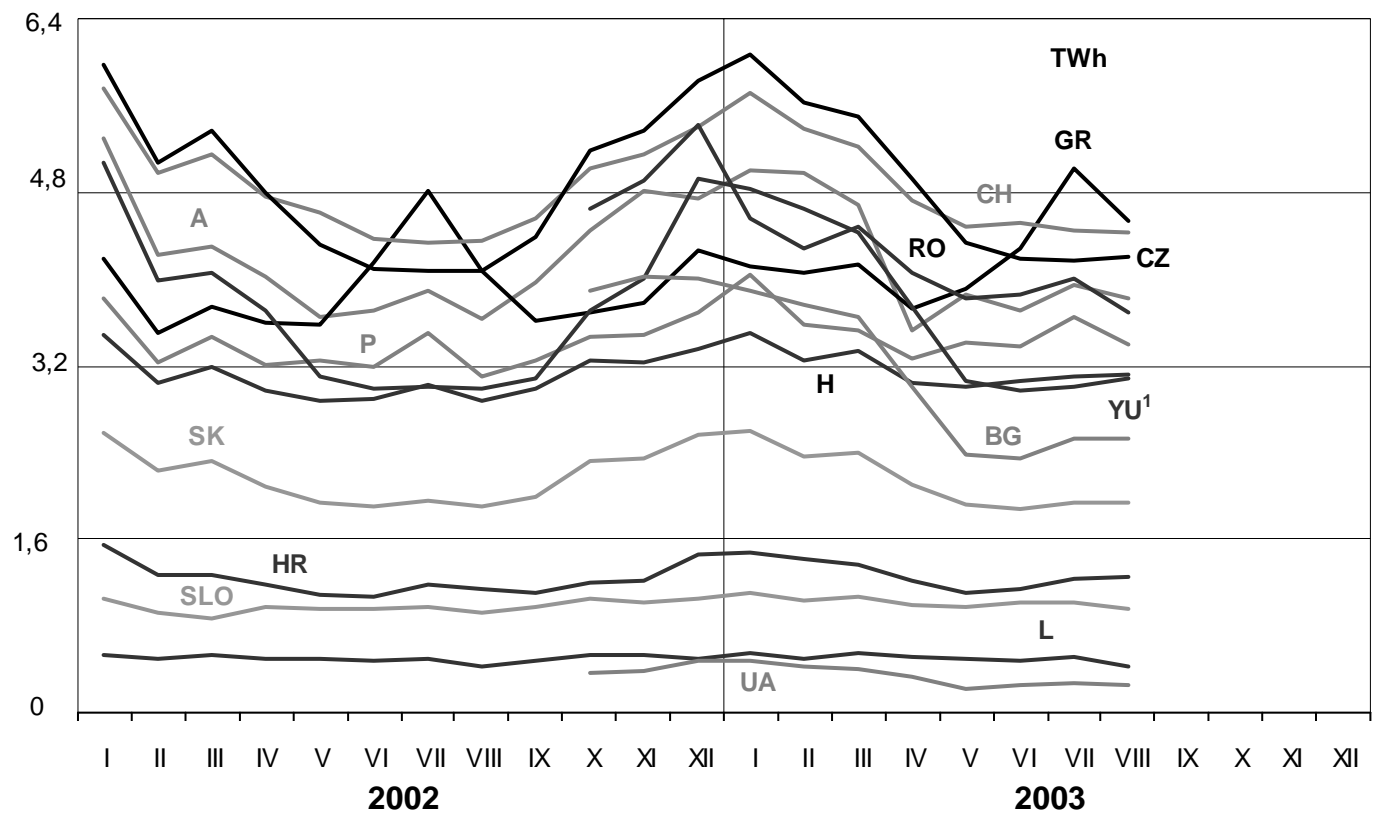
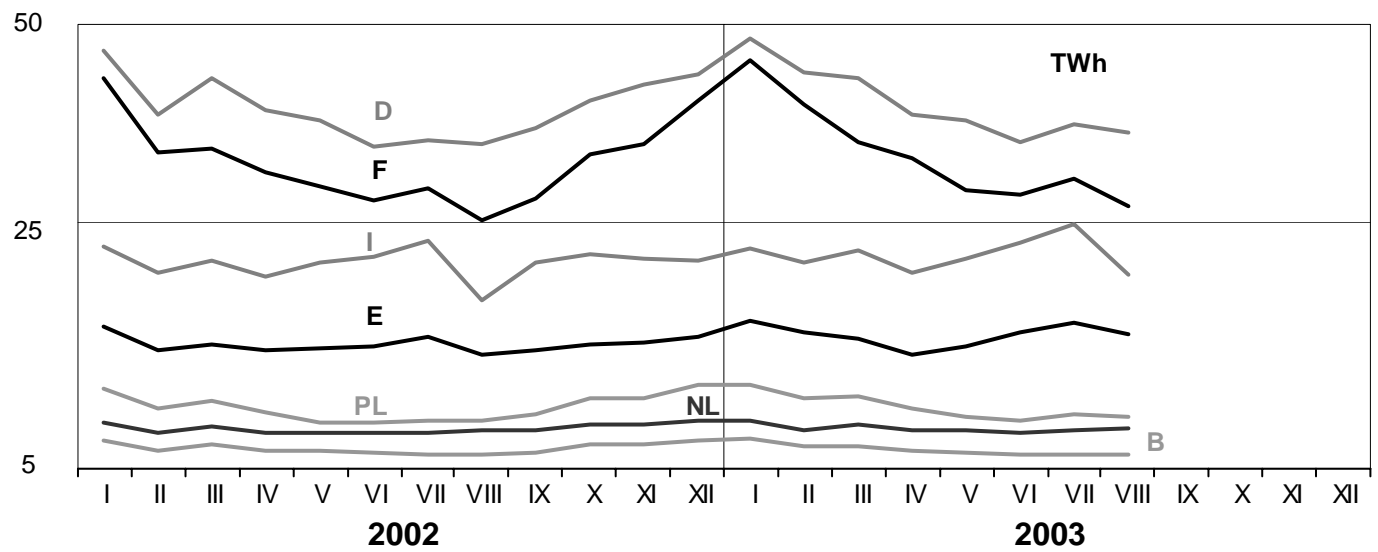
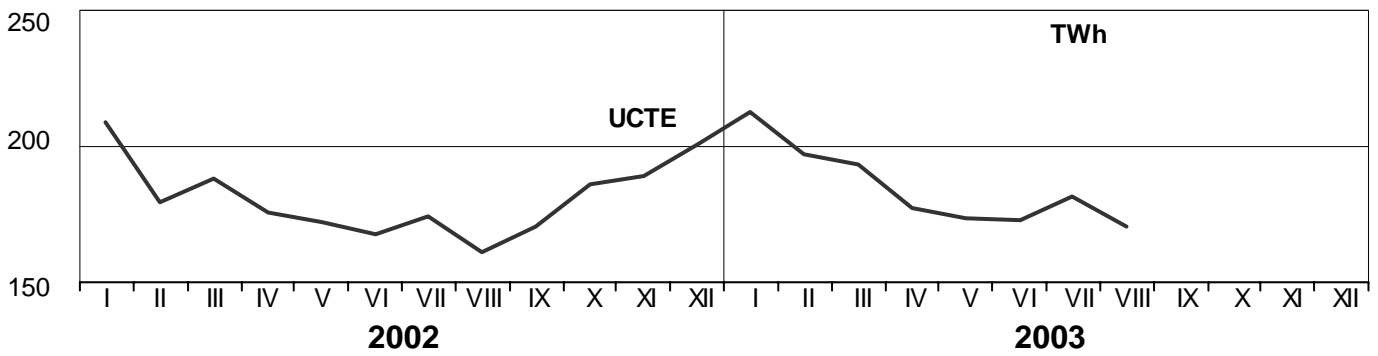
<sup>2</sup> Denmark (Jutland)

These physical energy flows were measured on the cross-frontier transmission lines (≥ 110 kV) listed in table 9 of the Statistical Yearbook. These values may differ from the official statistics and the exchange balances in chapter 1.

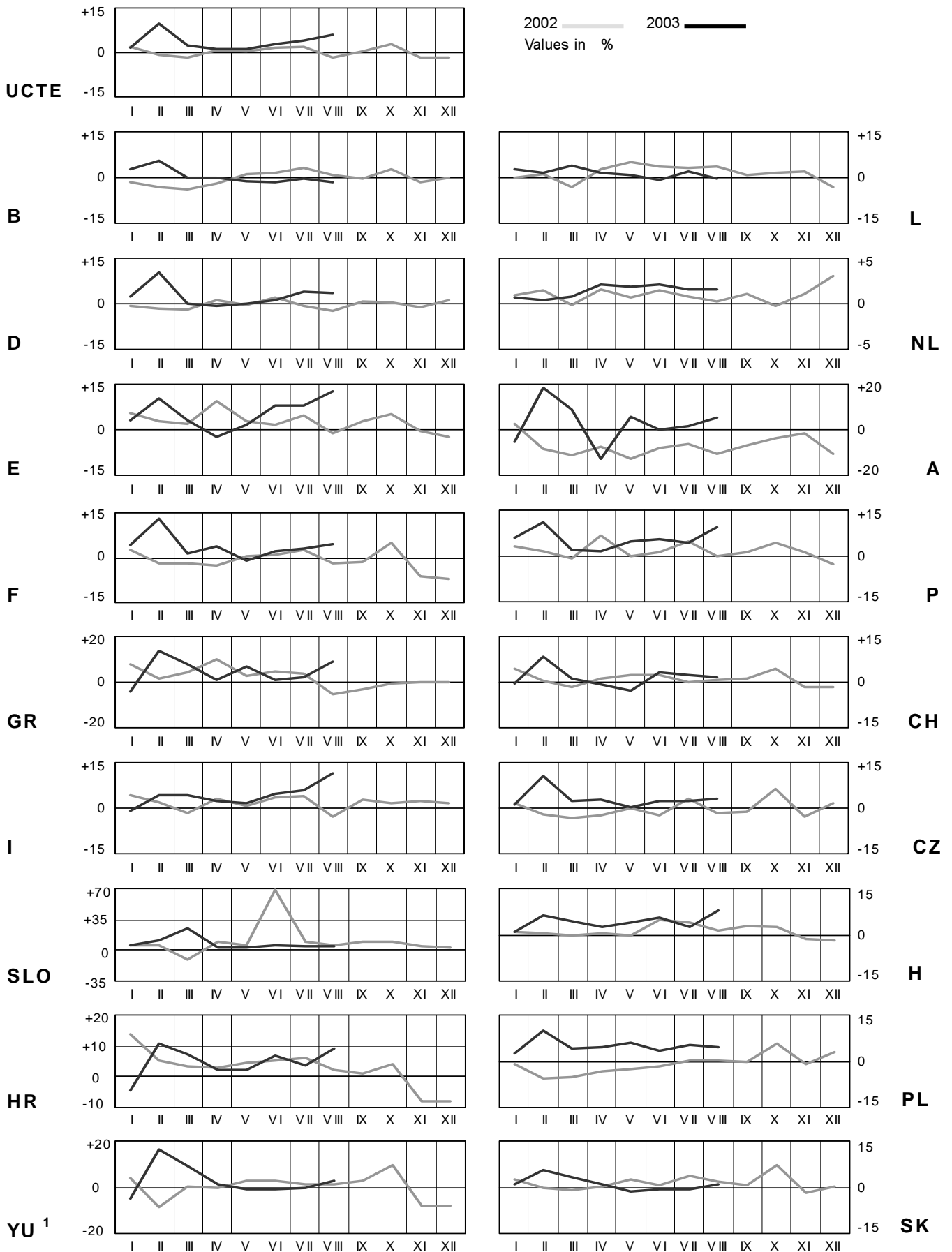
# 3

## Monthly consumption

August 2003



<sup>1</sup> YU = FRY + FYROM (Federal Republic of Yugoslavia and former Yugoslav Republic of Macedonia)

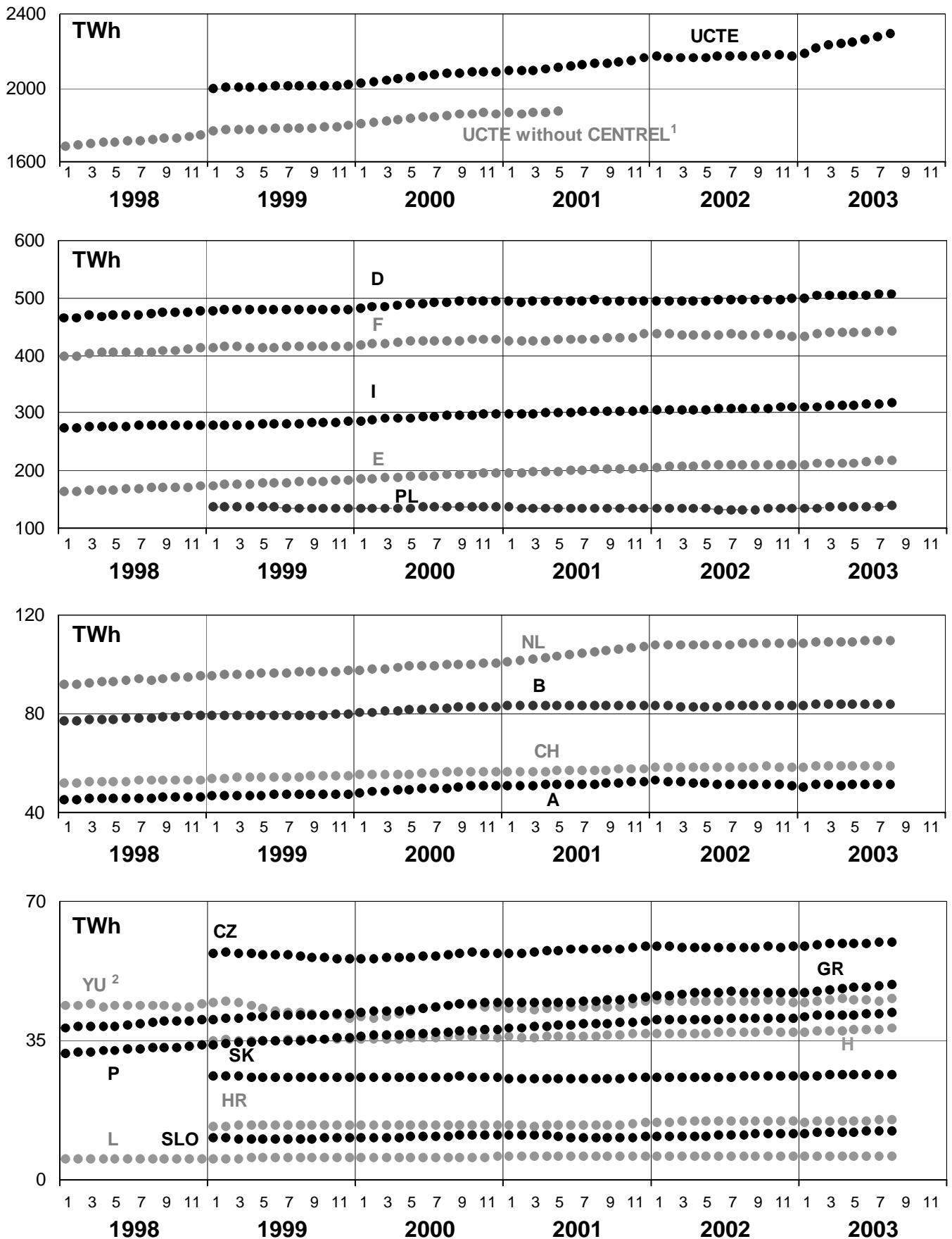


<sup>1</sup>YU = FRY + FYROM (Federal Republic of Yugoslavia and former Yugoslav Republic of Macedonia)

# 5

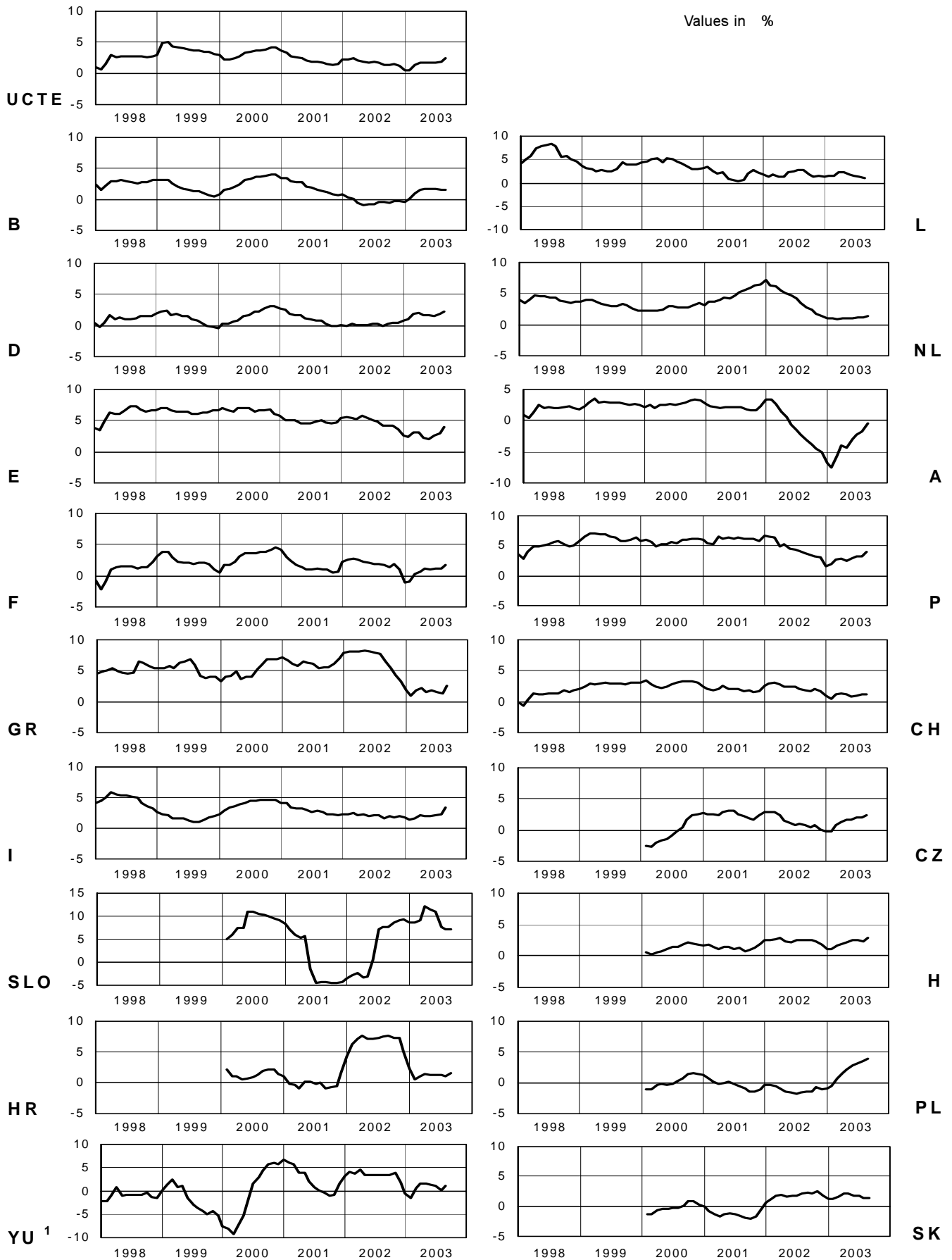
## Consumption of last 12 months

August 2003



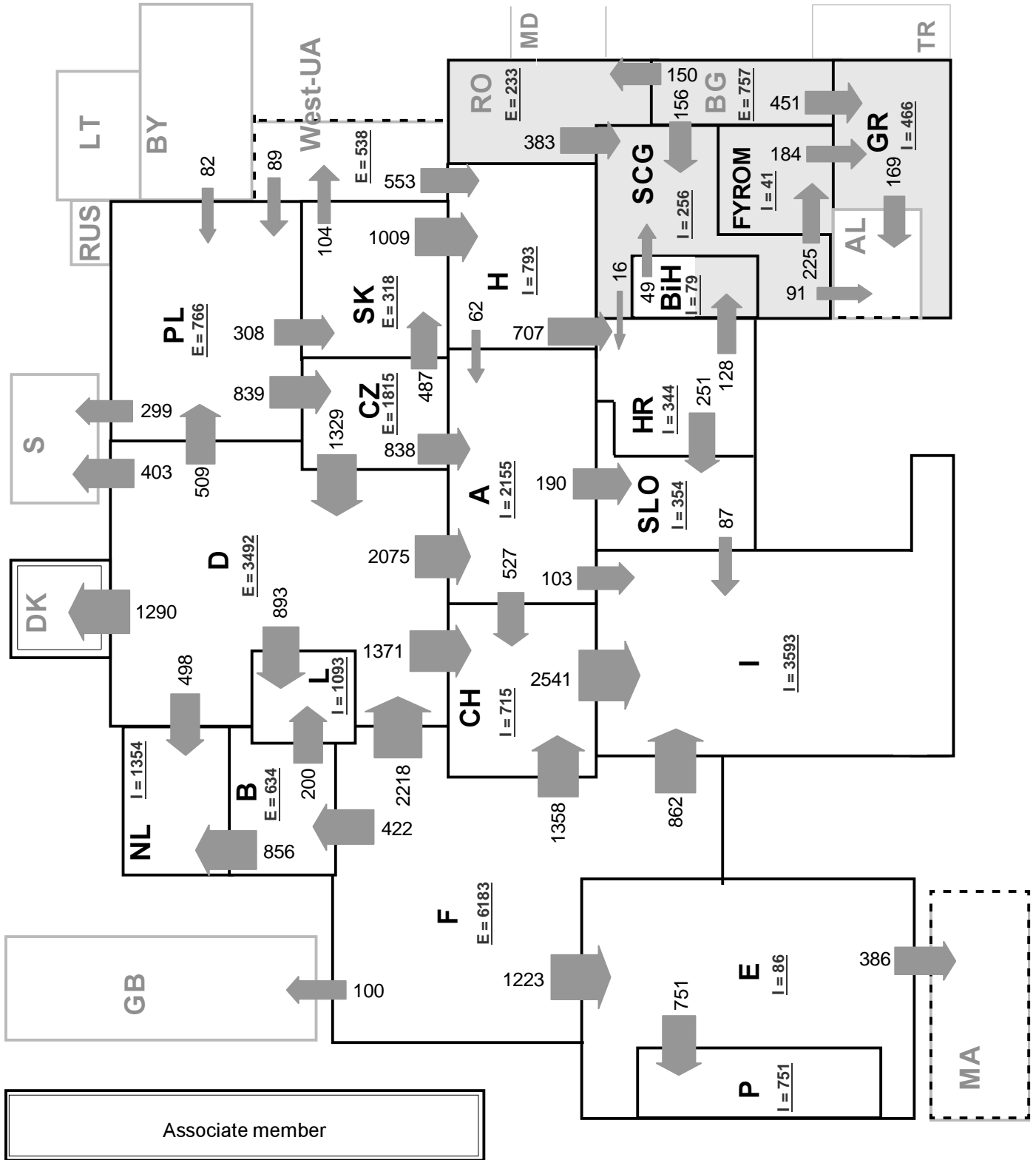
<sup>1</sup> CENTREL countries CZ, H, PL and SK member of UCTE from May 2001

<sup>2</sup> YU = FRY + FYROM (Federal Republic of Yugoslavia and former Yugoslav Republic of Macedonia)



<sup>1</sup> YU = FRY + FYROM (Federal Republic of Yugoslavia and former Yugoslav Republic of Macedonia)





**Sum of load flows in MW:**

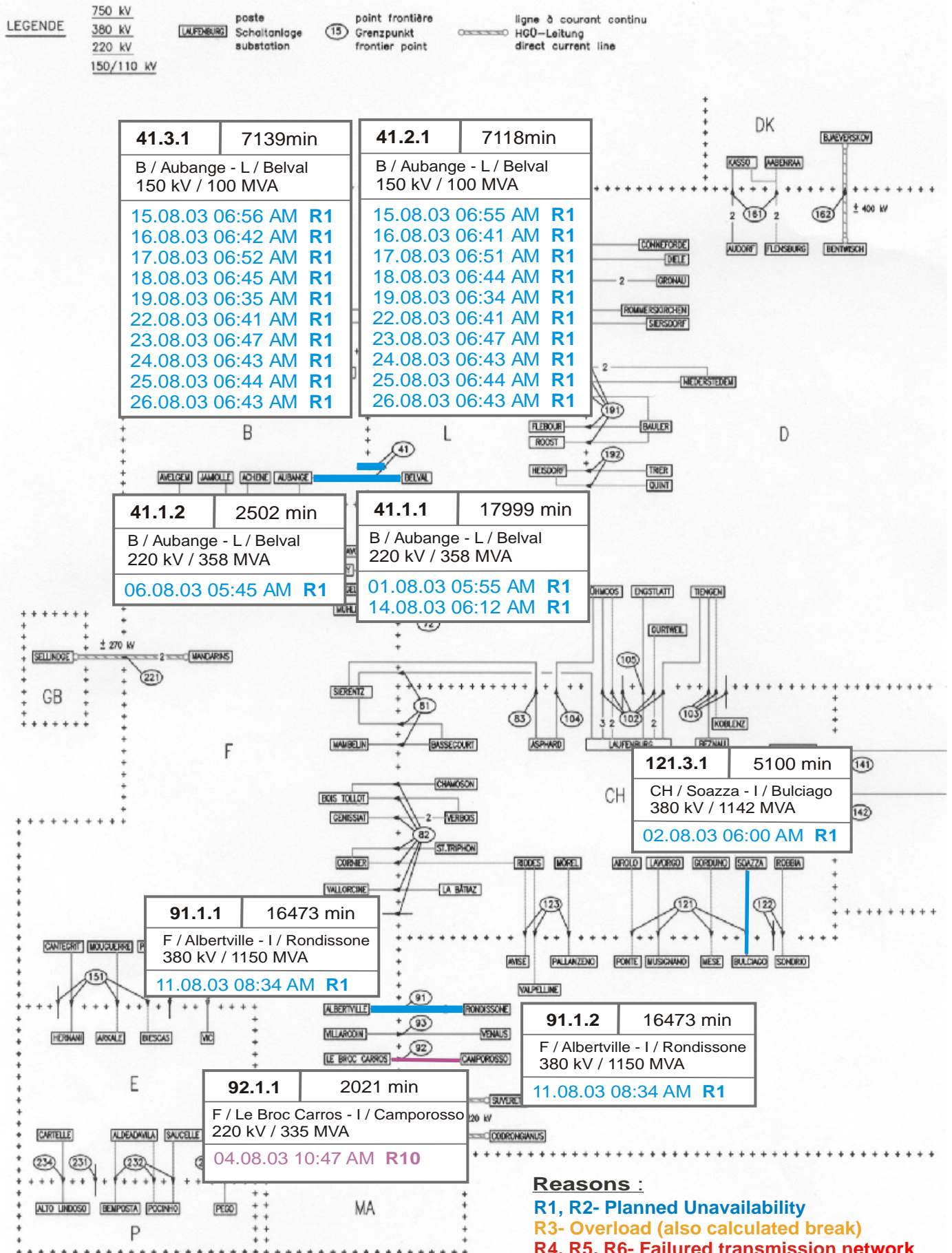
UCTE = 24256      Total = 27822

\* Central European Time (CET)

I = Import balance

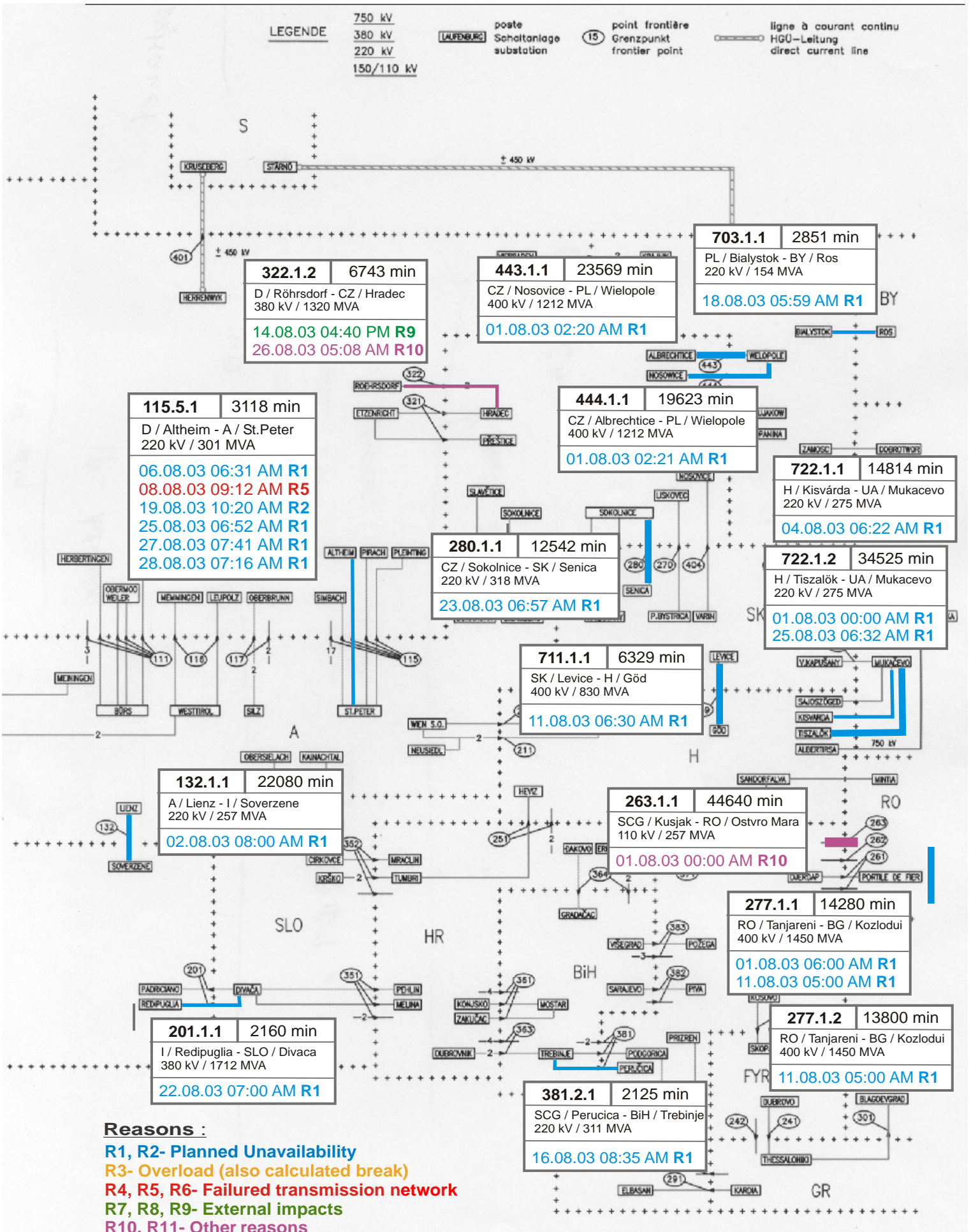
E = Export balance



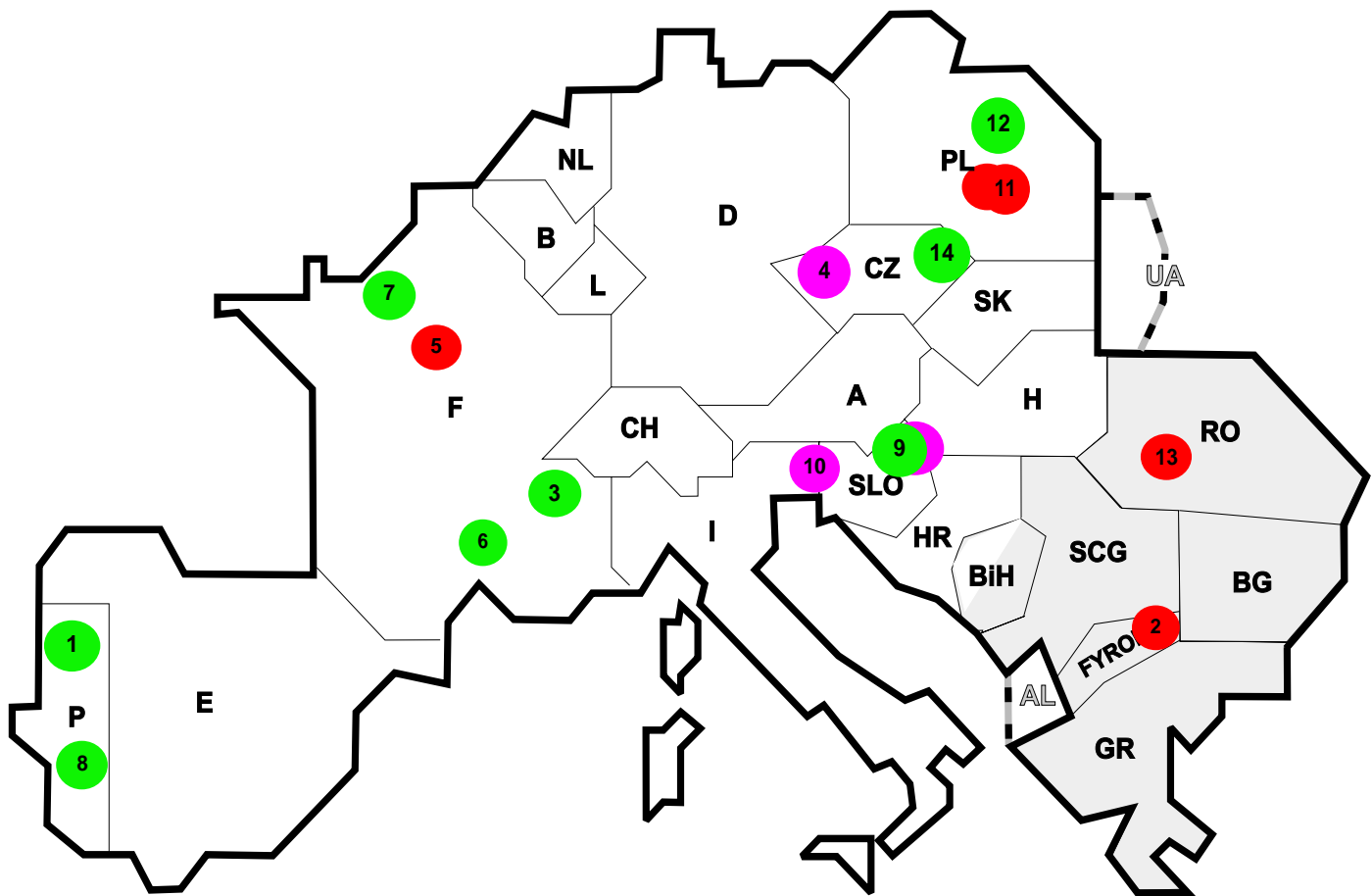


**Reasons :**

- R1, R2- Planned Unavailability
- R3- Overload (also calculated break)
- R4, R5, R6- Failed transmission network
- R7, R8, R9- External impacts
- R10, R11- Other reasons



- Reasons :**
- R1, R2- Planned Unavailability
  - R3- Overload (also calculated break)
  - R4, R5, R6- Failed transmission network
  - R7, R8, R9- External impacts
  - R10, R11- Other reasons



Reasons:

**R3** Overload

**R7, R8, R9** External impacts (animals...)

**R4, R5, R6** Failure in the transmission network

**R10, R11** Other reasons

Nbr	Country	Substation	Reason	Energie not supplied [ MWh ]	Total loss of power [ MW ]	Restoration time [ min ]	Equivalent time of interruption <sup>1</sup>
1	P	Palmela	R9	811	1270	120	15,83
2	FYROM	Sk4	R4	120	120	10	15,14
3	F	Malgovert	R8	62	70	54	0,08
4	CZ	Chodov	R10	48	0	14	0,00
5	F	Pasquier	R4	17	99	11	0,12
6	F	Boutre	R7	12	1	738	0,00
7	F	Chambry	R8	6	76	7	0,09
8	P	Mogadouro	R7	5	0	68	0,00
9	SLO	Divaca	R8, R11	0	0	8	0,00
10	SLO	Krsko	R11	0	0	385	0,00
11	PL	Wielopole	R6	0	215	2	0,82
12	PL	Konin	R7	0	300	84	1,14
13	RO	Lotru	R5	0	350	4	5,62
14	CZ	Hradec	R9	0	922	23250	8,11

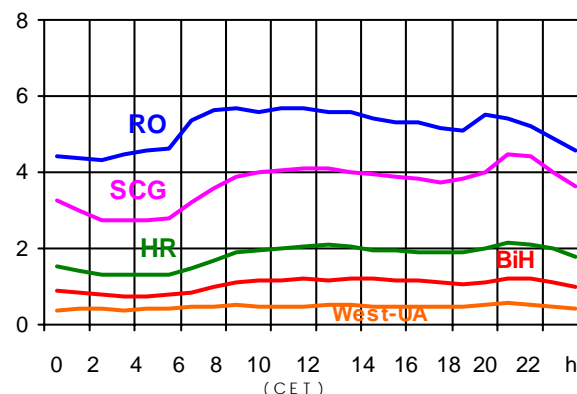
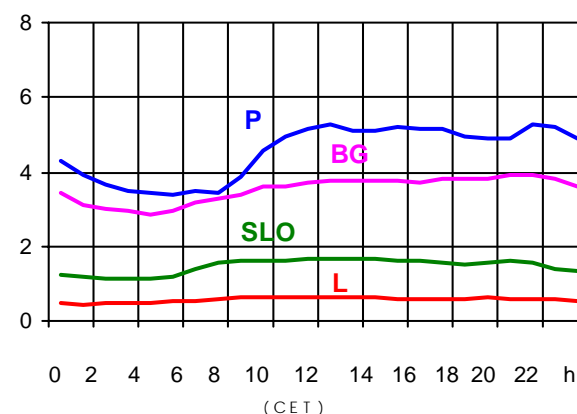
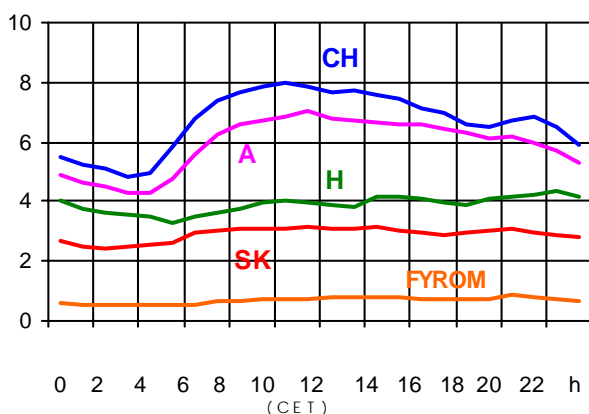
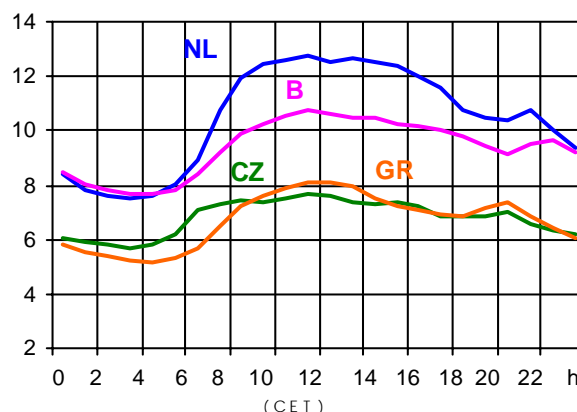
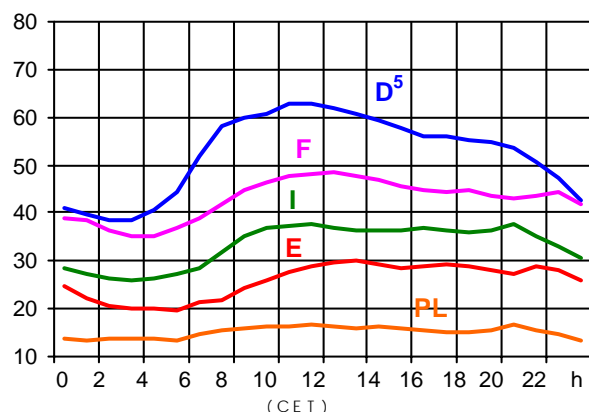
<sup>1</sup> ( year [in min] \* power loss) / consumption last 12 months

Control area	Prog_exp	Prog_imp	Prog_exp3	Prog_imp3	Prog_exp11	Prog_imp11
B	565721	629962	683	487	471	979
D	2550548	2655216	3398	3237	3656	4263
E	581895	695267	1217	1200	558	700
F	6239508	1899952	7562	1379	8601	3584
GR	127153	358096	0	497	0	580
I	97173	3118051	0	3593	88	3698
SLO	378997	542673	504	874	566	915
HR	220028	591546	446	555	265	530
BiH	81	155	83	178	31	150
FYROM	9900	57500	40	51	0	120
SCG	420784	640030	499	640	648	1094
NL	440254	1830910	434	1759	164	3140
A	1011972	433310	1443	395	1428	809
P	16155	443851	0	800	0	550
CH	2179827	1679949	2226	2918	3370	2060
CZ	1752856	295105	2204	331	1954	726
H	306875	1024898	547	1332	538	1334
PL	874877	118008	961	190	1737	125
SK	640541	454671	745	391	970	616
RO	6898	0	202	0	332	10
BG	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
West-UA	303420	0	450	0	450	0

- Control areas can differ from national borders ( i.e. German block which includes parts of A, L and DK ).
- Values are calculated on an hourly base ( MWh ).
- This values are not the provisional values entered in the VULCANUS system, but the definitive values after an eventual correction during the actual date.
- Prog\_exp: Sum of all positive values of every hour of every border
- Prog\_imp: Sum of all negative values of every hour of every border
- Prog\_exp3: Sum of all positive values the third Wednesday from 02:00 to 03:00 a.m.
- Prog\_imp3: Sum of all negative values the third Wednesday from 02:00 to 03:00 a.m.
- Prog\_exp11: Sum of all positive values the third Wednesday from 10:00 to 11:00 a.m.
- Prog\_imp11: Sum of all negative values the third Wednesday from 10:00 to 11:00 a.m.

### Consumption hourly load curves<sup>1</sup> on 20.08.03

Values in GW



	Peak load MW	$\Delta$ % <sup>2</sup>	Cons_load_repr <sup>1</sup> %	Parallel load <sup>3</sup> MW
B	10727	-4,5	100	10283
D	62900	1,0	91	64500
E	30179	10,2	94	27556
F <sup>4</sup>	48419	-2,7	97	53714
GR <sup>4</sup>	8145	21,8	93	7263
I	37488	9,6	100	32878
SLO	1686	5,7	95	1277
HR	2151	11,9	100	1483
BIH	1233	n.a.	100	1053
FYROM	839	n.a.	100	639
SCG	4497	n.a.	96	3581
L	661	-10,8	99	659
NL	12782	1,5	90	9655
A	7069	-2,2	82	7233
P	5287	8,7	91	4064
CH	7990	-1,6	100	10237
CZ	7682	12,0	100	8587
H	4340	-6,6	100	3198
PL	16796	3,9	100	18161
SK	3141	2,2	100	3363
<b>UCTE</b>	<b>280215</b>	<b>3,4</b>		<b>279663</b>
DK <sup>6</sup>				2580
RO	5697	n.a.	100	5679
BG	3943	n.a.	100	4600
West-UA	596	n.a.	100	958

<sup>1</sup> Percentage as referred to total values in %

<sup>2</sup> Variation as compared to corresponding month of the previous year

<sup>3</sup> Including autoproduction

<sup>4</sup> The representativity of data referring to the whole country, including the systems of the Greek islands, is 93%. The representativity of data to the interconnected system is 99%.

<sup>5</sup> Values estimated on the basis of former data from the German Federal Office for Statistics

<sup>6</sup> Denmark (Jutland)



## Contact

Boulevard Saint-Michel, 15  
B-1040 Brussels - Belgium  
Tel +3227416940 - Fax +3227416949

[info@ucte.org](mailto:info@ucte.org)  
[www.ucte.org](http://www.ucte.org)