

H04L

(21) Int. Application Number: PCT/SE96/01749	(51) International Patent Classification ⁶ : H04L 12/64, 12/40	(11) Int. Publication Number: WO 97/24845
(22) Int. Filing Date: 23 December 1996 (23.12.96)	A1	(43) Int. Publication Date: 10 July 1997 (10.07.97)
(30) Priority Data: 9504680-1 28 December 1995 SE (28.12.95)	(54) Title: DEFRAGMENTATION METHOD AND ARRANGEMENT IN A DYNAMIC SYNCHRONOUS TRANSFER MODE NETWORK	
(71) Applicant (for all designated States except US): DYNARC AB [SE/SE]; Hagavägen 10, S-171 53 Solna (SE).		
(72) Inventors; and (75) Inventors/Applicants (for US only): BOHM, Christer [SE/SE]; S:t Paulsgatan 28 A, S-118 48 Stockholm (SE). LINDGREN, Per [SE/SE]; Maria Prästgårdsgatan 12, S-118 52 Stockholm (SE). RAMPFELT, Lars [SE/SE]; Svanekegränd 1, 2tr., S-164 40 Kista (SE).	(57) Abstract	
(74) Agent: L.A. GROTH & CO. KB; P.O. Box 6107, S-102 32 Stockholm (SE).	The present invention relates to a defragmentation method and arrangement for increase of the average block size of free tokens in the nodes of a DTM (Dynamic Synchronous Transfer Mode) network. The defragmentation comprises defining a home node for each token at network startup in such a way that the tokens sharing the same home node will always define at least partly a continuous slot range, sending back free tokens to home nodes when a significant time has passed and, merging two or more slot-consecutive tokens with the same slot range into a single token when existing in the free pool of a node. The defragmentation can be realized in a central or a distributed token management scheme.	
(81) Designated States: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, GR, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SE, SG, SI, SK, TJ, TM, TR, TT, UA, UG, US, UZ, VN, ARIPO patent (KE, LS, MW, SD, SZ, UG), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG).	Published With international search report.	

(21) Int. Application Number: PCT/SE96/01750	(51) International Patent Classification ⁶ : H04L 12/64, 12/40, 12/42	(11) Int. Publication Number: WO 97/24846
(22) Int. Filing Date: 23 December 1996 (23.12.96)	A1	(43) Int. Publication Date: 10 July 1997 (10.07.97)
(30) Priority Data: 9504681-9 28 December 1995 SE (28.12.95)	(54) Title: METHOD AND ARRANGEMENT FOR NETWORK RESOURCE ADMINISTRATION	
(71) Applicant (for all designated States except US): DYNARC AB [SE/SE]; Hagavägen 10, S-171 53 Solna (SE).	(57) Abstract	
(72) Inventors; and (75) Inventors/Applicants (for US only): BOHM, Christer [SE/SE]; S:t Paulsgatan 28A, S-118 48 Stockholm (SE). LINDGREN, Per [SE/SE]; Maria Prästgårdsgatan 12, S-118 52 Stockholm (SE). RAMPFELT, Lars [SE/SE]; Svanekegränd 1, 2tr., S-164 40 Kista (SE). HIDELL, Markus [SE/SE]; Kyrkvägen 38, S-181 42 Lidingsö (SE). SJÖDIN, Peter [SE/SE]; Linnégatan 18B, S-753 32 Uppsala (SE).	The present invention relates to a method and an arrangement for centralized and distributed management of the capacity in a circuit-switched network with a bus or ring structure, especially a network of DTM-type (Dynamic Synchronous Transfer Mode), which network uses a bandwidth which is partitioned in cycles, which in turn are partitioned in control time slots for signalling and data time slots for transfer of data, and wherein each data time slot is associated with a token. In the centralized version, a first node, called server node, is allocated tokens corresponding to all data time slots which are flowing in one direction in a bus or a ring. A second node is requesting tokens corresponding to a certain capacity from the server node, and the server node makes reservations for and transfers tokens corresponding to requested capacity to the other node in event the server node has requested capacity unutilized. The number of server nodes in the distributed version is between two and the total number of nodes in the bus or ring.	
(74) Agent: L.A. GROTH & CO. KB; P.O. Box 6107, S-102 32 Stockholm (SE).	Published With international search report. With amended claims. In English translation (filed in Swedish).	
(81) Designated States: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, HU, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, TJ, TM, TR, TT, UA, UG, US, UZ, VN, ARIPO patent (KE, LS, MW, SD, SZ, UG), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG).		