

BOX ASSIGNMENTS

11-21-2002

DO NOT USE FOR TRADEMARKS

TO THE ASSISTANT COMMISSIONER  
SIR: PLEASE RECORD THIS ASSIGNMENT

Y

102288812

REOF.

1. NAME OF CONVEYING PARTY(IES) (ASSIGNORS(S)):

1. Risto AALTO
3. Timo HALONEN
- 5.
- 7.

2. Esa TUOVINEN
- 4.
- 6.
- 8.

ADDITIONAL NAME(S) OF CONVEYING PARTY(IES) ATTACHED? ☐ YES ☒ NO

2. PARTY(IES) (ASSIGNEE(S)) RECEIVING INTEREST:

NAME: Nokia Telecommunications Oy

ADDRESS: Keilalahdentie 4, FIN-02150, Espoo, FINLAND

ADDITIONAL NAME(S) & ADDRESS(ES) ATTACHED? ☐ YES ☒ NO

3. NATURE OF CONVEYANCE (DOCUMENT):

(Submit herewith only one document for recordation—multiple copies of same Assignment signed by different inventors is one document)

- ☒ ASSIGNMENT OF ☒ WHOLE ☐ PART INTEREST  
☐ ORIGINAL ☒ FACSIMILE/PHOTOCOPY  
☐ CHANGE OF NAME ☐ VERIFIED TRANSLATION  
☐ SECURITY ☐ MERGER ☐ OTHER:

EXEC. DATE: 1) 1) May 16, 1997; 2) April 16, 1998; 3) April 17, 1998

EXECUTION DATE(S) ON THE DECLARATION IF FILED HERewith: (NOTE: IF DATES ON DECLARATION AND ASSIGNMENT DIFFER SEE ATTY!)

4.5 APPL. NO.(S) OR PAT NO.(S). OTHERS ON ADDITIONAL SHEET(S) attached? ☐ YES ☒ NO

A. PAT. APP. NO.(S) series code/serial no	M#	1 <sup>st</sup> INVENTOR if not in item 1	B. PATENT NO(S)	M#	1 <sup>st</sup> INVENTOR if not in item 1
09/480,173	258574	AALTO			

5. Name & Address of Party to Whom Correspondence  
Concerning Document Should be Mailed:

Pillsbury Winthrop LLP  
Intellectual Property Group  
P.O. Box 10500 McLean, VA 22102

6. NUMBER INVOLVED:

APPLNS 1 + PATS 0 = TOTAL = 1

7. AMOUNT OF FEE DUE: (Code 581)

ABOVE TOTAL x \$40 = \$40

5.5 ATTY DKT:

P 258574

2951671US/CON/42887/jar

8. PLEASE CHARGE TO OUR DEPOSIT ACCOUNT

NUMBER: 03-3975

UNDER ORDER NO

60258

258574

MATTER NO.

CLIENT REF.

dup. sheet not required

CLIENT NO.

MATTER NO.

9. To the best of my knowledge and belief, the foregoing information is true and correct and any attached copy is a true copy of the original document.

10. Total number of pages including this  
cover sheet, attachments and document  
(do not file dup. Cover sheet)

2

Signature

Attorney: Christine H. McCarthy

Reg. No. 41844

Atty/Sec: CHM/jrh

TEL: (703) 905-2143

Date: November 12, 2002

FAX: (703) 905-2500

FILE WITH PTO RETURN RECEIPT (PAT-103A)

11/21/2002 6TON11 00000022 033975 09480173

01 FC:8021 40.00 CH

Use return signed/recorded to:

Pillsbury Madison & Sutro LLP  
Intellectual Property Group  
Ninth Floor, East Tower  
1100 New York Avenue, N.W.  
Washington, D.C. 20005-3918



USA Patent Appln.  
Sole or Joint

For Inventions made outside USA  
executed with or after application

Atty. Dkt. PMS

M#

Client Ref.

NONPROVISIONAL

**ASSIGNMENT  
OF NONPROVISIONAL APPLICATION**

NONPROVISIONAL

In consideration of the sum of Ten Dollars (\$10.00) and other good and valuable consideration paid to each of the undersigned, to wit:

INSERT  
NAME(S) OF  
INVENTOR(S)

(1) Esa TUOVINEN	(2) Timo HELONEN
(3)	(4)
(5)	<input type="checkbox"/> x box if continued on page 2

the receipt and sufficiency of which are hereby acknowledged by the undersigned who at the request of, hereby sell(s), assign(s) and transfer(s) unto:

INSERT  
NAME(S) OF  
ASSIGNEE(S)  
& ADDRESS(ES)

NOKIA TELECOMMUNICATIONS OY  
KEILALAHDENTIE 4  
FIN-02150 ESPOO, FINLAND

(hereinafter designated "ASSIGNEE") the entire right, title and interest for the United States of America as defined in 35 U.S.C. 100, in the invention and all applications including any and all divisions, continuations, substitutes, and reissues thereof; and all resulting patents, known as

TITLE OF  
INVENTION

INCREASING THE CAPACITY OF A CELLULAR RADIO NETWORK

for which the undersigned executed an application for Letters Patents of the United States of America:

NOTE → →

(Complete

line A, B and/or C)

(A) ☐ even date herewith

(B) ☐ on June 12, 1997

(C) ☒ in U.S. Appln. 08/849,711  
No.

filed June 12, 1997

AND the undersigned hereby authorize(s) and request(s) the United States Commissioner of Patents and Trademarks to issue said Letters Patent to the said ASSIGNEE, for its interest as ASSIGNEE, its successors, assigns and legal representatives; the undersigned agree(s) that the attorney of record in said application shall hereinafter act on behalf of said ASSIGNEE;

AND the undersigned hereby agree(s) to testify and execute any papers for ASSIGNEE, its successors, assigns and legal representatives, deemed essential by ASSIGNEE to ASSIGNEE'S full protection and title in and to the invention hereby transferred.

NOTE → → The undersigned hereby authorize(s) Pillsbury Madison & Sutro LLP of the above address to insert hereon any further identification necessary or desirable for recordation of this document.

**INVENTORS**

**DATE SIGNED**

**WITNESSES**

1): [Signature]  
Name: Esa TUOVINEN

16.4.1998

[Signature]

2): [Signature]  
Name: Timo HALONEN

17.4.1998

[Signature]

3):  
Name:

4) Name:

5) Name:

Please return signed/recorded to:  
Cushman Darby & Cushman, LLP.  
Ninth Floor, East Tower  
1100 New York Avenue, N.W.  
Washington, D.C. 20005-3918



USA Patent Appln.  
Sole or Joint

Any. Dkt.

For Inventions made outside USA  
executed with or after application

Client Ref.

NONPROVISIONAL

NONPROVISIONAL

## ASSIGNMENT OF NONPROVISIONAL APPLICATION

In consideration of the sum of Ten Dollars (\$10.00) and other good and valuable consideration paid to each of the undersigned, to wit:

INSERT  
NAME(S) OF  
INVENTOR(S)

(1) Risto Aalto	(4)
(2)	(5)
(3)	[ ] x box if continued on page 2

the receipt and sufficiency of which are hereby acknowledged by the undersigned who at the request of, hereby sell(s), assign(s) and transfer(s) unto:

INSERT  
NAME(S) OF  
ASSIGNEE(S)  
& ADDRESS(ES)

Nokia Telecommunications Oy

Keilalahdentie 4

FIN-02150 Espoo

Finland

(hereinafter designated "ASSIGNEE") the entire right, title and interest for the United States of America as defined in 35 U.S.C. 100, in the invention and all applications including any and all divisions, continuations, substitutes, and reissues thereof, and all resulting patents, known as

TITLE OF  
INVENTION

Increasing the capacity of a cellular radio network

for which the undersigned executed an application for Letters Patent of the United States of America:

NOTE ---  
(Complete  
line A, B and/or C)

(A) ☒ even date herewith

(B) ☐ on

(C) ☐ in U.S. Appln. No. / filed

AND the undersigned hereby authorize(s) and request(s) the United States Commissioner of Patents and Trademarks to issue said Letters Patent to the said ASSIGNEE, for its interest as ASSIGNEE, its successors, assigns and legal representatives; the undersigned agree(s) that the attorney of record in said application shall hereinafter act on behalf of said ASSIGNEE.

AND the undersigned hereby agree(s) to testify and execute any papers for ASSIGNEE, its successors, assigns and legal representatives, deemed essential by ASSIGNEE to ASSIGNEE'S full protection and title in and to the invention hereby transferred.

NOTE --- The undersigned hereby authorize(s) Cushman Darby & Cushman, LLP. of the above address to insert hereon any further identification necessary or desirable for recordation of this document.

INVENTOR(S)	DATE SIGNED	WITNESSES
1) <u>Risto Aalto</u> Name: Risto Aalto	<u>16.5.1997</u>	<u>[Signature]</u>
2) _____ Name: _____	_____	_____
3) _____ Name: _____	_____	_____
4) _____ Name: _____	_____	_____
5) _____ Name: _____	_____	_____

IF ADDITIONAL INVENTORS, check box ☐ and continue on page 2.