502080188 10/01/2012

PATENT ASSIGNMENT

Electronic Version v1.1 Stylesheet Version v1.1

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
PATENT BUSINESS DEVELOPMENT, LLC	03/06/2012

RECEIVING PARTY DATA

Name:	Clearwater Innovations, LLC	
Street Address:	3411 Silverside Road, Suite 108	
Internal Address:	Webster Building	
City:	Wilmington	
State/Country:	DELAWARE	
Postal Code:	19810	

PROPERTY NUMBERS Total: 6

Property Type	Number	
Patent Number:	5396519	
Patent Number:	5600712	
Patent Number:	5784405	
Patent Number:	6072825	
Patent Number:	6160790	
Patent Number:	6084885	

CORRESPONDENCE DATA

Fax Number:

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NAME OF SUBMITTER:

M. Vanessah Melton

Total Attachments: 3

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> PATENT REEL: 029054 FRAME: 0234

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EXHIBIT F

ASSIGNMENT

1. WHEREAS Patent Business Development LLC, having a place of business at 506 Bald Eagle Drive, Jupiter, Florida 33477, (hereafter, together with any successors, legal representatives or assigns thereof, called "Assignor") is the owner of the entire right, title, and interest and assignee of the patents listed below ("Patents"):

Patent or Application		grant and	Title of Patent and Named
Number	Country	Filing Date	Inventor(s)
US 5,396,519	US	Oct 22, 1993	Method and Apparatus for Adaptively Providing Precoding and Preemphasis Conditioning to Signal Data for Transfer over a Communication Channel William L. Betts; Edward S. Zuranski
US 5,600,712	US	Apr 5, 1996	Enabling Technique for Quickly Establishing High Speed PSTN Connections in Telecommuting Applications Bruce L. Hanson; Kurt E. Holmquist; Lee B. Strahs
US 5,784,405	ŬS	Aug 23, 1996	Noncooperative Feedback System and Method for a Compensation System Associated with a Transmitter or Codec William Lewis Betts; Keith Alan Souders
US 6,072,825 (continuation of '405)	US	Sep 23, 1997	Noncooperative Feedback System and Method for a Compensation System Associated with Transmitter Or Codec William Lewis Betts; Keith Alan Souders
US 6,160,790	US	Feb 28, 1997	Crosstalk Canceller System and Method Gordon Bremer
US 6,084,885	US	Feb 23, 1998	Apparatus and Method for DSP Sharing Using Statistical Properties of Data Rober E. Scott

AND WHEREAS, Clearwater Innovations, LLC, a Delaware limited liability company, having a place of business at 3411 Silverside Road, Suite 108, Webster Building, Wilmington, DE 19810, (hereafter, together with any successors, legal representatives or assigns thereof, called "ASSIGNEE") wants to acquire the entire right, title and interest in and to said Patents and to all the inventions therein, and Assignor is willing to enter into such assignment.

PATENT REEL: 029054 FRAME: 0235 NOW, THEREFORE, effective on March 6, 2012, and in consideration of the sum of One Dollar (\$1.00) in hand paid and other good and valuable consideration the receipt of which from ASSIGNEE is hereby acknowledged, Assignor has sold, assigned, transferred and set over, and does hereby sell, assign, transfer and set over to ASSIGNEE the entire right, title and interest in said Patents, and all patents, patent applications, foreign patents, foreign patent applications, continuations, continuations-in-part, divisionals, extensions, renewals, reissues and re-examinations related to all inventions thereof, including without limitation, all rights to claim priority on the basis thereof, all rights to sue for past, present and future infringement, including the right to collect and receive any damages, royalties, or settlements for such infringements, all rights to sue for injunctive or other equitable relief, and any and all causes of action relating to any of the inventions or discoveries thereof,

Assignor hereby covenants that it has full right to convey the entire interest herein assigned, and that it has not executed, and will not execute, any agreement in conflict with this Assignment;

Assignor hereby further covenants and agrees that it will communicate to ASSIGNEE any and all facts known to it respecting said patents, and testify in any legal proceedings, sign all lawful papers, execute and deliver all papers and take any actions that may be necessary or desirable to perfect the title to any aforementioned patents and inventions, execute all divisions, continuation, reexamination, reissue and substitute applications, and make all rightful oaths and generally do everything possible to aid ASSIGNEE to obtain and enforce proper patent protection for said inventions in all countries.

> PATENT REEL: 029054 FRAME: 0236

I certify under PENALTY OF PERJURY under the laws of the State of <u>Ylarial</u> that the foregoing paragraph is true and correct. WITNESS my hand and official seal.

Micolette Blok

Signature of Notary

NICOLETTE BLAKE
Notary Public, Stars of Florida
Commissions 8E 144632
My centm; 888188 Nev. 68; 2015

PATENT REEL: 029054 FRAME: 0237

RECORDED: 10/01/2012