

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1
 Stylesheet Version v1.2

EPAS ID: PAT7492414

SUBMISSION TYPE:	NEW ASSIGNMENT	
NATURE OF CONVEYANCE:	ASSIGNMENT	
CONVEYING PARTY DATA		
	Name	Execution Date
	YULIANG LI	08/09/2022
	HASSAN MOHAMED GAMAL HASSAN WASSEL	08/10/2022
	BEHNAM MONTAZERI	08/16/2022
	WEIHUANG WANG	08/10/2022
	SRINIVAS VADUVATHA	08/10/2022
	NANDITA DUKKIPATI	08/17/2022
	PRASHANT R. CHANDRA	08/09/2022
	MASOUD MOSHREF JAVADI	08/09/2022
RECEIVING PARTY DATA		
Name:	GOOGLE LLC	
Street Address:	1600 AMPHITHEATRE PARKWAY	
City:	MOUNTAIN VIEW	
State/Country:	CALIFORNIA	
Postal Code:	94043	
PROPERTY NUMBERS Total: 1		
Property Type	Number	
Application Number:	17879853	
CORRESPONDENCE DATA		
Fax Number:	(908)654-7866	
<i>Correspondence will be sent to the e-mail address first; if that is unsuccessful, it will be sent using a fax number, if provided; if that is unsuccessful, it will be sent via US Mail.</i>		
Phone:	(908) 654-5000	
Email:	assignment@lernerdavid.com	
Correspondent Name:	LERNER, DAVID, LITTENBERG, KRUMHOLZ & MENTLIK, LLP	
Address Line 1:	20 COMMERCE DR.	
Address Line 4:	CRANFORD, NEW JERSEY 07016	
ATTORNEY DOCKET NUMBER:	GOOGLE 3.0F-3750	
NAME OF SUBMITTER:	PATRICIA GIEBLER	
SIGNATURE:	/Patricia Giebler/	

DATE SIGNED:	08/18/2022
Total Attachments: 8 source=Executed Assignments#page1.tif source=Executed Assignments#page2.tif source=Executed Assignments#page3.tif source=Executed Assignments#page4.tif source=Executed Assignments#page5.tif source=Executed Assignments#page6.tif source=Executed Assignments#page7.tif source=Executed Assignments#page8.tif	

ASSIGNMENT OF PATENT APPLICATION	Docket Number (Optional) GOOGLE 3.0F-3750
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WHEREAS, I, Yuliang Li of Sunnyvale, California, have invented or discovered inventions or discoveries, the subject matter of which is described in the patent application entitled "Early Retransmission for Hardware Reliable Transport" (hereafter "Patent Application"),

☒ WHEREAS (if the left box is checked), the Patent Application was filed with the U.S. Patent and Trademark Office on August 3, 2022, Application Number 17/879,853, and

☐ WHEREAS (if the left box is checked), the Patent Application names the following inventors: (and whereas I hereby authorize Lerner, David, Littenberg, Krumholz & Mentlik, LLP, to insert in here in brackets [Application No. _____, filed on _____] the application number and filing date of the application when known), and

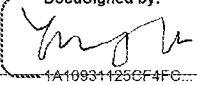
WHEREAS, Google LLC, incorporated or otherwise formed in Delaware and having a place of business at 1600 Amphitheatre Parkway, Mountain View, CA 94043 (hereafter, the "assignee") is desirous of acquiring, or has acquired and is desirous of memorializing its acquisition further herein, the entire right, title and interest in same;

NOW, THEREFORE, for good and valuable consideration the receipt of which is hereby acknowledged, I agree as follows. I agree to assign, and hereby do assign, to the assignee my entire right, title and interest in and to the Assigned Applications in the United States of America and all other countries, where "Assigned Applications" means the Patent Application, including any and all inventions, discoveries and other subject matter described therein, any divisional, continuation, continuation-in-part, substitute, reissue, re-examination or other application claiming priority or benefit to the Patent Application pursuant to any law or treaty, and any patent issuing from the foregoing. I agree to assign, and hereby do assign, to assignee the right to claim such priority or benefit. I have not previously conveyed, nor am I aware of an obligation to convey, my rights in the Assigned Applications to a third party. I hereby authorize the U.S. Patent and Trademark Office, and any other governmental agency in the world, to issue to assignee all patents resulting from the Assigned Applications and to record assignee's ownership thereof. At assignee's reasonable request I agree, without further remuneration, to execute and deliver documents prepared at assignee's expense and to provide other cooperation, such as testimony, as may be reasonably required to evidence or protect assignee's rights in the Assigned Applications. Assignee may assign or transfer all or part of its rights set forth herein in its sole discretion. I agree that the assignee may affix its signature to this document as well as any other indicia of its acceptance of the provisions hereof. If any provision herein is unenforceable, the requirements of the provision shall remain to the full extent permissible by law and the offending portions thereof shall be deemed replaced, to the extent possible, with a provision most closely reflecting the purpose of the offending provision.

8/9/2022

(Date)

DocuSigned by:



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(Signature)

ASSIGNMENT OF PATENT APPLICATION	Docket Number (Optional) GOOGLE 3.0F-3750
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WHEREAS, I, Hassan Mohamed Gamal Hassan Wassef of San Jose, California, have invented or discovered inventions or discoveries, the subject matter of which is described in the patent application entitled "Early Retransmission for Hardware Reliable Transport" (hereafter "Patent Application"),

☒ WHEREAS (if the left box is checked), the Patent Application was filed with the U.S. Patent and Trademark Office on August 3, 2022, Application Number 17/879,853, and

☐ WHEREAS (if the left box is checked), the Patent Application names the following inventors: (and whereas I hereby authorize Lerner, David, Littenberg, Krumholz & Mentlik, LLP, to insert in here in brackets [Application No. _____, filed on _____] the application number and filing date of the application when known), and

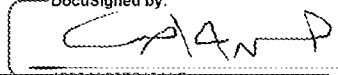
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8/10/2022

(Date)

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(Signature)

ASSIGNMENT OF PATENT APPLICATION	Docket Number (Optional) GOOGLE 3.0F-3750
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WHEREAS, I, Behnam Montazeri of San Jose, California, have invented or discovered inventions or discoveries, the subject matter of which is described in the patent application entitled "Early Retransmission for Hardware Reliable Transport" (hereafter "Patent Application"),

☒ WHEREAS (if the left box is checked), the Patent Application was filed with the U.S. Patent and Trademark Office on August 3, 2022, Application Number 17/879,853, and

☐ WHEREAS (if the left box is checked), the Patent Application names the following inventors: (and whereas I hereby authorize Lerner, David, Littenberg, Krumholz & Mentlik, LLP, to insert in here in brackets [Application No. _____, filed on _____] the application number and filing date of the application when known), and

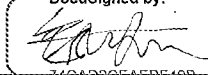
WHEREAS, Google LLC, incorporated or otherwise formed in Delaware and having a place of business at 1600 Amphitheatre Parkway, Mountain View, CA 94043 (hereafter, the "assignee") is desirous of acquiring, or has acquired and is desirous of memorializing its acquisition further herein, the entire right, title and interest in same;

NOW, THEREFORE, for good and valuable consideration the receipt of which is hereby acknowledged, I agree as follows. I agree to assign, and hereby do assign, to the assignee my entire right, title and interest in and to the Assigned Applications in the United States of America and all other countries, where "Assigned Applications" means the Patent Application, including any and all inventions, discoveries and other subject matter described therein, any divisional, continuation, continuation-in-part, substitute, reissue, re-examination or other application claiming priority or benefit to the Patent Application pursuant to any law or treaty, and any patent issuing from the foregoing. I agree to assign, and hereby do assign, to assignee the right to claim such priority or benefit. I have not previously conveyed, nor am I aware of an obligation to convey, my rights in the Assigned Applications to a third party. I hereby authorize the U.S. Patent and Trademark Office, and any other governmental agency in the world, to issue to assignee all patents resulting from the Assigned Applications and to record assignee's ownership thereof. At assignee's reasonable request I agree, without further remuneration, to execute and deliver documents prepared at assignee's expense and to provide other cooperation, such as testimony, as may be reasonably required to evidence or protect assignee's rights in the Assigned Applications. Assignee may assign or transfer all or part of its rights set forth herein in its sole discretion. I agree that the assignee may affix its signature to this document as well as any other indicia of its acceptance of the provisions hereof. If any provision herein is unenforceable, the requirements of the provision shall remain to the full extent permissible by law and the offending portions thereof shall be deemed replaced, to the extent possible, with a provision most closely reflecting the purpose of the offending provision.

8/16/2022

(Date)

DocuSigned by:



(Signature)

ASSIGNMENT OF PATENT APPLICATION	Docket Number (Optional) GOOGLE 3.0F-3750
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WHEREAS, I, Weihuang Wang of Los Gatos, California, have invented or discovered inventions or discoveries, the subject matter of which is described in the patent application entitled "Early Retransmission for Hardware Reliable Transport" (hereafter "Patent Application"),

☒ WHEREAS (if the left box is checked), the Patent Application was filed with the U.S. Patent and Trademark Office on August 3, 2022, Application Number 17/879,853, and

☐ WHEREAS (if the left box is checked), the Patent Application names the following inventors: (and whereas I hereby authorize Lerner, David, Littenberg, Krumholz & Mentlik, LLP, to insert in here in brackets [Application No. _____, filed on _____] the application number and filing date of the application when known), and

WHEREAS, Google LLC, incorporated or otherwise formed in Delaware and having a place of business at 1600 Amphitheatre Parkway, Mountain View, CA 94043 (hereafter, the "assignee") is desirous of acquiring, or has acquired and is desirous of memorializing its acquisition further herein, the entire right, title and interest in same;

NOW, THEREFORE, for good and valuable consideration the receipt of which is hereby acknowledged, I agree as follows. I agree to assign, and hereby do assign, to the assignee my entire right, title and interest in and to the Assigned Applications in the United States of America and all other countries, where "Assigned Applications" means the Patent Application, including any and all inventions, discoveries and other subject matter described therein, any divisional, continuation, continuation-in-part, substitute, reissue, re-examination or other application claiming priority or benefit to the Patent Application pursuant to any law or treaty, and any patent issuing from the foregoing. I agree to assign, and hereby do assign, to assignee the right to claim such priority or benefit. I have not previously conveyed, nor am I aware of an obligation to convey, my rights in the Assigned Applications to a third party. I hereby authorize the U.S. Patent and Trademark Office, and any other governmental agency in the world, to issue to assignee all patents resulting from the Assigned Applications and to record assignee's ownership thereof. At assignee's reasonable request I agree, without further remuneration, to execute and deliver documents prepared at assignee's expense and to provide other cooperation, such as testimony, as may be reasonably required to evidence or protect assignee's rights in the Assigned Applications. Assignee may assign or transfer all or part of its rights set forth herein in its sole discretion. I agree that the assignee may affix its signature to this document as well as any other indicia of its acceptance of the provisions hereof. If any provision herein is unenforceable, the requirements of the provision shall remain to the full extent permissible by law and the offending portions thereof shall be deemed replaced, to the extent possible, with a provision most closely reflecting the purpose of the offending provision.

8/10/2022

(Date)

DocuSigned by:

Weihuang Wang

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(Signature)

ASSIGNMENT OF PATENT APPLICATION	Docket Number (Optional) GOOGLE 3.0F-3750
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WHEREAS, I, Srinivas Vaduvatha of San Jose, California, have invented or discovered inventions or discoveries, the subject matter of which is described in the patent application entitled "Early Retransmission for Hardware Reliable Transport" (hereafter "Patent Application"),

☒ WHEREAS (if the left box is checked), the Patent Application was filed with the U.S. Patent and Trademark Office on August 3, 2022, Application Number 17/879,853, and

☐ WHEREAS (if the left box is checked), the Patent Application names the following inventors: (and whereas I hereby authorize Lerner, David, Littenberg, Krumholz & Mentlik, LLP, to insert in here in brackets [Application No. _____, filed on _____] the application number and filing date of the application when known), and

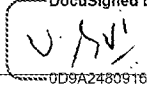
WHEREAS, Google LLC, incorporated or otherwise formed in Delaware and having a place of business at 1600 Amphitheatre Parkway, Mountain View, CA 94043 (hereafter, the "assignee") is desirous of acquiring, or has acquired and is desirous of memorializing its acquisition further herein, the entire right, title and interest in same;

NOW, THEREFORE, for good and valuable consideration the receipt of which is hereby acknowledged, I agree as follows. I agree to assign, and hereby do assign, to the assignee my entire right, title and interest in and to the Assigned Applications in the United States of America and all other countries, where "Assigned Applications" means the Patent Application, including any and all inventions, discoveries and other subject matter described therein, any divisional, continuation, continuation-in-part, substitute, reissue, re-examination or other application claiming priority or benefit to the Patent Application pursuant to any law or treaty, and any patent issuing from the foregoing. I agree to assign, and hereby do assign, to assignee the right to claim such priority or benefit. I have not previously conveyed, nor am I aware of an obligation to convey, my rights in the Assigned Applications to a third party. I hereby authorize the U.S. Patent and Trademark Office, and any other governmental agency in the world, to issue to assignee all patents resulting from the Assigned Applications and to record assignee's ownership thereof. At assignee's reasonable request I agree, without further remuneration, to execute and deliver documents prepared at assignee's expense and to provide other cooperation, such as testimony, as may be reasonably required to evidence or protect assignee's rights in the Assigned Applications. Assignee may assign or transfer all or part of its rights set forth herein in its sole discretion. I agree that the assignee may affix its signature to this document as well as any other indicia of its acceptance of the provisions hereof. If any provision herein is unenforceable, the requirements of the provision shall remain to the full extent permissible by law and the offending portions thereof shall be deemed replaced, to the extent possible, with a provision most closely reflecting the purpose of the offending provision.

8/10/2022

(Date)

DocuSigned by:



(Signature)

ASSIGNMENT OF PATENT APPLICATION	Docket Number (Optional) GOOGLE 3.0F-3750
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WHEREAS, I, Nandita Dukkipati of Palo Alto, California, have invented or discovered inventions or discoveries, the subject matter of which is described in the patent application entitled "Early Retransmission for Hardware Reliable Transport" (hereafter "Patent Application"),

☒ WHEREAS (if the left box is checked), the Patent Application was filed with the U.S. Patent and Trademark Office on August 3, 2022, Application Number 17/879,853, and

☐ WHEREAS (if the left box is checked), the Patent Application names the following inventors:
(and whereas I hereby authorize Lerner, David, Littenberg, Krumholz & Mentlik, LLP, to insert in here in brackets [Application No. _____, filed on _____] the application number and filing date of the application when known), and

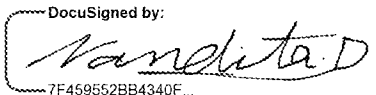
WHEREAS, Google LLC, incorporated or otherwise formed in Delaware and having a place of business at 1600 Amphitheatre Parkway, Mountain View, CA 94043 (hereafter, the "assignee") is desirous of acquiring, or has acquired and is desirous of memorializing its acquisition further herein, the entire right, title and interest in same;

NOW, THEREFORE, for good and valuable consideration the receipt of which is hereby acknowledged, I agree as follows. I agree to assign, and hereby do assign, to the assignee my entire right, title and interest in and to the Assigned Applications in the United States of America and all other countries, where "Assigned Applications" means the Patent Application, including any and all inventions, discoveries and other subject matter described therein, any divisional, continuation, continuation-in-part, substitute, reissue, re-examination or other application claiming priority or benefit to the Patent Application pursuant to any law or treaty, and any patent issuing from the foregoing. I agree to assign, and hereby do assign, to assignee the right to claim such priority or benefit. I have not previously conveyed, nor am I aware of an obligation to convey, my rights in the Assigned Applications to a third party. I hereby authorize the U.S. Patent and Trademark Office, and any other governmental agency in the world, to issue to assignee all patents resulting from the Assigned Applications and to record assignee's ownership thereof. At assignee's reasonable request I agree, without further remuneration, to execute and deliver documents prepared at assignee's expense and to provide other cooperation, such as testimony, as may be reasonably required to evidence or protect assignee's rights in the Assigned Applications. Assignee may assign or transfer all or part of its rights set forth herein in its sole discretion. I agree that the assignee may affix its signature to this document as well as any other indicia of its acceptance of the provisions hereof. If any provision herein is unenforceable, the requirements of the provision shall remain to the full extent permissible by law and the offending portions thereof shall be deemed replaced, to the extent possible, with a provision most closely reflecting the purpose of the offending provision.

8/17/2022

(Date)

DocuSigned by:



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(Signature)

ASSIGNMENT OF PATENT APPLICATION	Docket Number (Optional) GOOGLE 3.0F-3750
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WHEREAS, I, Prashant R. Chandra of San Jose, California, have invented or discovered inventions or discoveries, the subject matter of which is described in the patent application entitled "Early Retransmission for Hardware Reliable Transport" (hereafter "Patent Application"),

☒ WHEREAS (if the left box is checked), the Patent Application was filed with the U.S. Patent and Trademark Office on August 3, 2022, Application Number 17/879,853, and

☐ WHEREAS (if the left box is checked), the Patent Application names the following inventors: (and whereas I hereby authorize Lerner, David, Littenberg, Krumholz & Mentlik, LLP, to insert in here in brackets [Application No. _____, filed on _____] the application number and filing date of the application when known), and

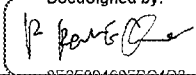
WHEREAS, Google LLC, incorporated or otherwise formed in Delaware and having a place of business at 1600 Amphitheatre Parkway, Mountain View, CA 94043 (hereafter, the "assignee") is desirous of acquiring, or has acquired and is desirous of memorializing its acquisition further herein, the entire right, title and interest in same;

NOW, THEREFORE, for good and valuable consideration the receipt of which is hereby acknowledged, I agree as follows. I agree to assign, and hereby do assign, to the assignee my entire right, title and interest in and to the Assigned Applications in the United States of America and all other countries, where "Assigned Applications" means the Patent Application, including any and all inventions, discoveries and other subject matter described therein, any divisional, continuation, continuation-in-part, substitute, reissue, re-examination or other application claiming priority or benefit to the Patent Application pursuant to any law or treaty, and any patent issuing from the foregoing. I agree to assign, and hereby do assign, to assignee the right to claim such priority or benefit. I have not previously conveyed, nor am I aware of an obligation to convey, my rights in the Assigned Applications to a third party. I hereby authorize the U.S. Patent and Trademark Office, and any other governmental agency in the world, to issue to assignee all patents resulting from the Assigned Applications and to record assignee's ownership thereof. At assignee's reasonable request I agree, without further remuneration, to execute and deliver documents prepared at assignee's expense and to provide other cooperation, such as testimony, as may be reasonably required to evidence or protect assignee's rights in the Assigned Applications. Assignee may assign or transfer all or part of its rights set forth herein in its sole discretion. I agree that the assignee may affix its signature to this document as well as any other indicia of its acceptance of the provisions hereof. If any provision herein is unenforceable, the requirements of the provision shall remain to the full extent permissible by law and the offending portions thereof shall be deemed replaced, to the extent possible, with a provision most closely reflecting the purpose of the offending provision.

8/9/2022

(Date)

DocuSigned by:



(Signature)

ASSIGNMENT OF PATENT APPLICATION	Docket Number (Optional) GOOGLE 3.0F-3750
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WHEREAS, I, Masoud Moshref Javadi of San Jose, California, have invented or discovered inventions or discoveries, the subject matter of which is described in the patent application entitled "Early Retransmission for Hardware Reliable Transport" (hereafter "Patent Application"),

☒ WHEREAS (if the left box is checked), the Patent Application was filed with the U.S. Patent and Trademark Office on August 3, 2022, Application Number 17/879,853, and

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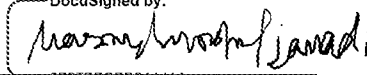
WHEREAS, Google LLC, incorporated or otherwise formed in Delaware and having a place of business at 1600 Amphitheatre Parkway, Mountain View, CA 94043 (hereafter, the "assignee") is desirous of acquiring, or has acquired and is desirous of memorializing its acquisition further herein, the entire right, title and interest in same;

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