PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT4847090

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	SECURITY INTEREST

CONVEYING PARTY DATA

Name	Execution Date
GLEASON CORPORATION	02/28/2018
THE GLEASON WORKS	02/28/2018
GLEASON GERMANY (HOLDINGS) GMBH	02/28/2018
GLEASON SALES CORPORATION	02/28/2018
ALLIANCE TOOL CORPORATION	02/28/2018
GLEASON SALES (AMERICAS) CORPORATION	02/28/2018
GLEASON CUTTING TOOLS CORPORATION	02/28/2018
GLEASON INTERNATIONAL HOLDINGS, LLC	02/28/2018
GLEASON METROLOGY SYSTEMS CORPORATION	02/28/2018

RECEIVING PARTY DATA

Name:	MANUFACTURERS AND TRADERS TRUST COMPANY
Street Address:	1 FOUNTAIN PLAZA
Internal Address:	3RD FLOOR
City:	BUFFALO
State/Country:	NEW YORK
Postal Code:	14203

PROPERTY NUMBERS Total: 88

Property Type	Number
Patent Number:	9868168
Patent Number:	9796060
Patent Number:	9796031
Patent Number:	9796030
Patent Number:	9782848
Patent Number:	9649707
Patent Number:	9573211
Patent Number:	9289839
Patent Number:	9278420
Patent Number:	9216466
Patent Number:	9192998

PATENT REEL: 045482 FRAME: 0170

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Property Type	Number
Patent Number:	9186738
Patent Number:	9132493
Patent Number:	9108258
Patent Number:	9033625
Patent Number:	8967926
Patent Number:	8967013
Patent Number:	8961081
Patent Number:	8899002
Patent Number:	8833773
Patent Number:	8821216
Patent Number:	8795028
Patent Number:	8790159
Patent Number:	8777230
Patent Number:	8714536
Patent Number:	8684637
Patent Number:	8660684
Patent Number:	8573087
Patent Number:	8561277
Patent Number:	8277285
Patent Number:	8267624
Patent Number:	8182313
Patent Number:	7886415
Patent Number:	7836803
Patent Number:	7748718
Patent Number:	7682222
Patent Number:	7651383
Patent Number:	7553115
Patent Number:	7462092
Patent Number:	7364391
Patent Number:	7228643
Patent Number:	7182674
Patent Number:	7118459
Patent Number:	6939214
Patent Number:	6824449
Patent Number:	6808440
Patent Number:	6712566
Patent Number:	6676337
Patent Number:	6390893

Property Type	Number
Patent Number:	6217409
Patent Number:	6120355
Patent Number:	6120217
Application Number:	14439789
Application Number:	14440666
Application Number:	14442736
Application Number:	14781753
Application Number:	14911055
Application Number:	14912411
Application Number:	15221993
Application Number:	15308102
Application Number:	15504432
Application Number:	15509509
Application Number:	15531008
Application Number:	15544931
Application Number:	15545433
Application Number:	15572520
Application Number:	62222501
Application Number:	62221351
Application Number:	62261026
Application Number:	62289470
Application Number:	62319555
Application Number:	62338653
Application Number:	62377834
Application Number:	62422066
Application Number:	62480581
Application Number:	62531917
Application Number:	29596229
Application Number:	29596233
Application Number:	29596236
Application Number:	29625243
Application Number:	29625262
Patent Number:	8801503
Application Number:	15572916
Patent Number:	9329595
Application Number:	15524443
Application Number:	62301772
Application Number:	62385520

Property Type	Number
Application Number:	62575631

CORRESPONDENCE DATA

Fax Number: (312)569-3000

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.

Email: ipdockets@dbr.com

Correspondent Name: MITA K. LAKHIA

Address Line 1: 191 N. WACKER DRIVE, STE 3700
Address Line 2: DRINKER BIDDLE & REATH LLP
Address Line 4: CHICAGO, ILLINOIS 60606-1698

ATTORNEY DOCKET NUMBER:	466593
NAME OF SUBMITTER:	MITA K. LAKHIA
SIGNATURE:	/Mita K. Lakhia/
DATE SIGNED:	03/01/2018

Total Attachments: 24

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EXECUTION VERSION

GRANT OF FIRST PRIORITY SECURITY INTEREST IN UNITED STATES PATENTS

This GRANT OF FIRST PRIORITY SECURITY INTEREST IN UNITED STATES

PATENTS, dated June 10, 2011 (as amended, supplemented or otherwise modified from time to

time, the "Patent Security Agreement"), is granted by The Gleason Works, a New York

corporation, with principal offices at 1000 University Avenue, Rochester, New York 14692,

Gleason Cutting Tools Corporation, a Delaware corporation, with principal offices at 1000

University Avenue, Rochester, New York 14692, and Gleason Metrology Systems Corporation,

an Ohio corporation, with principal offices at 300 Progress Road, West Carrollton, Ohio 45449

(together, the "Assignors") in favor of Manufacturers and Traders Trust Company, as Collateral

Agent, with principal offices at 1 Fountain Plaza 3rd Floor, Buffalo, New York 14203 (the

"Assignee"), for good and valuable consideration, the sufficiency and receipt of which are

hereby acknowledged.

Under the terms of the Security Agreement (as defined below) and the Security

Documents related thereto, the Assignors granted a security interest in certain property,

including, without limitation, certain Intellectual Property, to the Assignee for the ratable benefit

of the Secured Parties, and have agreed as a condition thereof to execute this Patent Security

Agreement for recording with the United States Patent and Trademark Office.

Each Assignor does hereby assign and transfer unto the Assignee for the equal and

ratable benefit of all of the Secured Parties, and does hereby separately pledge and grant to the

Assignee for the equal and ratable benefit of all of the Secured Parties, in each case as security

for the prompt payment and performance when due of all Obligations, a Lien on and a

continuing first priority (subject to Permitted Liens) security interest in all of the right, title and

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PATENT

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interest of such Assignor in, to and under (i) any patents which any Assignor now or hereafter owns and any divisions, reissues, reexaminations, continuations (including, but not limited to, continuations-in-parts) and improvements thereof, as well as any patent applications owned by any Assignor, including without limitation, those patents and patent applications set forth on Schedule A (the "Patents"), (ii) all causes of action arising prior to or after the date hereof for infringement of any of the Patents, and (iii) all Proceeds (as such term is defined in the Security Agreement referred to below) and products of the foregoing.

This Patent Security Agreement is made to secure the prompt payment and performance when due of all the Secured Obligations of the Assignors, as such term is defined in the Security Agreement among the Assignors, the other assignors from time to time party thereto and the Assignee, dated as of June 10, 2011 (as amended from time to time, the "Security Agreement"; capitalized terms used but not defined herein shall have the meaning given such terms in the Security Agreement) and shall be effective as of the date of the Security Agreement. Upon termination of the Security Agreement pursuant to Section 10.9(a) thereof, the Assignee shall, upon satisfaction of all such Obligations, execute, acknowledge, and deliver to the Assignors an instrument in writing releasing the security interest in the Patents acquired under this Patent Security Agreement.

This Patent Security Agreement has been made in conjunction with the continuing Lien on and first priority (subject to Permitted Liens) security interest granted to the Assignee under the Security Agreement. The rights and remedies of the Assignee with respect to the Lien and first priority (subject to Permitted Liens) security interest granted herein are without prejudice to, and are in addition to those set forth in the Security Agreement, all terms and provisions of which are incorporated herein by reference. In the event that any provisions of this Patent

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Security Agreement are deemed to conflict with the Security Agreement, the provisions of the Security Agreement shall govern.

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IN WITNESS WHEREOF, the undersigned have executed this Patent Security Agreement as of the date first written above.

THE GLEASON

Name: John J. Perrotti

Title: President and Chief Executive Officer

GLEASON CUTAING TOOLS CORPORATION,

as Assignor

By_

Name: John J. Perrotti Title: President

GLEASON METROLOGY SYSTEMS

CORPORATION

Name: John J. Perrotti

Title: President

[Signature Page to Patent Security Agreement]

MANUFACTURERS AND TRADERS TRUST COMPANY, as Collateral Agent and as Assignee

By:

Name: Jon M. Fogle
Title: Vice President

[Signature Page to Patent Security Agreement]

SCHEDULE OF PATENTS AND PENDING APPLICATIONS

THE GLEASON WORKS

Patent Number (Application)	Description	Date Issued (Applied)
7,886,415	Machine Tool	February 15, 2011
7,836,803	Quick-Adjust Draw Rod Positioning Nut	November 23, 2010
7,794,186	Gear Cutting Machine, In Particular Bevel Gear Cutting Machine, Having A Device For Chamfering/Deburring The Edges Of A Work Piece	September 14, 2010
7,748,718	Expandable Mandrel	July 6, 2010
7,712,227	Carriage Arrangement For A Machine Tool	May 11, 2010
7,682,222	Variable Rate Method Of Grinding Gears	March 23, 2010
7,651,383	Method Of Lapping Gears	January 26, 2010
7,553,115	Gear Testing and Lapping Machine	June 30, 2009
7,462,092	Method Of Finishing Bevel Gears To Produce A Diffuse Surface Structure	December 9, 2008
7,364,391	Manufacturing Straight Bevel Gears	April 29, 2008
7,228,643	Method Of Gaging On Gear Lapping And Testing Machines	June 12, 2007
7,182,674	Coolant Delivery Apparatus For Machine Tool	February 27, 2007
7,118,459	Dressing Tool For Profiling The Tip Area Of A Grinding Wheel For Threaded Wheel Grinding	October 10, 2006
6,939,214	Honing Wheel Having Internal Gearing	September 6, 2005
6,824,449	Clamping Assembly	November 30, 2004
6,808,440	Method Of Grinding Cutting Blades	October 26, 2004
6,712,566	Machine And Method For Producing Bevel Gears	March 30, 2004

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6,676,337	Tool For Chamfering And Deburring The End Face Tooth Edges Of Gear Wheels	January 14, 2004
6,669,415	Machine For Producing Bevel Gears	December 30, 2003
6,481,508	Spindle For Machine Tool	November 19, 2002
6,390,893	Method For Machining Gears	May 21, 2002
6,217,421	Method Of Lapping Gears	April 17,2001
6,217,409	Threaded Grinding Wheel And Method Of Dressing	April 17, 2001
6,190,241	A Method And An Internally Toothed Tool For The Precision Machining Of Gear Wheels And A Method And Dressing Wheel For Dressing The Tool	February 20, 2001
6,120,355	Method And Apparatus For Lapping Gears	September 19, 2000
6,120,217	Cutting Tool For Producing Toothed Articles	September 19, 2000
6,050,755	Apparatus For Chamfering And Deburring Geared Tooth End Edges	April 18, 2000
6,004,078	Cutting Tool For Toothed Articles	December 21, 1999
5,895,180	Method Of Determining Cutting Blade Positional Errors In Face Hobbing Cutters	April 20, 1999
5,890,846	Cutting Tool For Toothed Articles	April 6, 1999
5,839,943	Truing Cutter Heads	November 24, 1998
5,761,067	Evaluating A Toothed Work Piece For Machining Based On Accumulated Pitch Variation	June 2, 1998
5,738,569	Threaded Grinding Wheel, And Method Of Dressing	April 14, 1998
5,716,174	Tool Feeding Method	February 10, 1998
5,645,467	Method For The Precision Machining Of Gear- wheels	July 8, 1997
5,609,058	Method Of Determining Backlash	March 11, 1997
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5,580,298	Method Of Producing Tooth Flank Surface Modifications	December 3, 1996
5,573,449	Threaded Grinding Wheel, Method Of Dressing, And Grinding A Workpiece Therewith	November 12, 1996
5,443,338	Machine For The Precision Working Of The Tooth Flanks Of Gear-Shaped Workpieces With An Internally Toothed Tool	August 22, 1995
5,395,189	Method For Precision Working Of Crowned And/or Conical Tooth Systems	March 7, 1995
5,377,457	Method For Generating Of Gear-Shaped Precision-Working Tools, In Particular For Regrinding Shaving Gears, And A Gear-Shaped Tool, In Particular A Shaving Gear, To Which The Method Can Be Applied	January 3, 1995
5,310,295	Tool Feeding Method In Gear Manufacturing Processes	May 10, 1994
5,289,815	Method Of Dressing A Threaded Grinding Wheel	March 1, 1994
5,228,814	Gear Hobbing Machine	July 20, 1993
(11/167,502)	Full Point Width Cutter	(June 27, 2005)
(11/243,264)	Magnetic Spindle For Machine Tool	(October 4, 2005)
(11/439,550)	Method Of Maintaining A Constant Grinding Process	(May 24, 2006)
(12/080,292)	Variable Rate Method Of Grinding Gears	(April 2, 2008)
(12/151,521)	Tool For Improved Chip Flow	(November 13, 2008)
(12/215,127)	Carriage Arrangement For A Machine Tool	(January 8, 2009)
(12/215,142)	Method And Device For Machining Work Pieces That Rotate Around A Work Piece Axis	(January 8, 2009)
(12/758,986)	Arrangement To Connect A Tool Wheel And A Tool Holding Fixture	(April 13, 2010)
(12/759,025)	Method An Device For Removing A Secondary Burr On An End-Cut Work Piece Wheel	(April 13, 2010)

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Runout Compensation On Machine Tools	(July 20, 2010)
Manufacturing Bevel Gears	(December 7, 2010)
Device For Securing A Tool To A Spindle	(April 28, 2011)
Cradle For Machining Of Large Pinions	(May 2, 2011)
Hypoid Gears With Low Shaft Angles	(May 4, 2011)
Adaptive Control Of A Machining Process	(June 6, 2011)
Method And Tool For Manufacturing Face Gears	(August 3, 2009)
Workholding Apparatus For Machine Tool	(September 17, 2009)
Apparatus For Chamfering And/Or Deburring Of Gears	(September 25, 2009)
Probe Mechanism For Machine Tool	(October 1, 2009)
Compensating Arbor	(November 10, 2009)
Method And Apparatus For Manufacturing Bevel Gears	(December 22, 2009)
Continuous Method For Manufacturing Face Gears	(January 29, 2010)
Stroke Length Adjustment Mechanism For A Machine Tool	(August 23, 2010)
Workholding Apparatus For Workpiece Transfer	(September 13, 2010)
	Manufacturing Bevel Gears Device For Securing A Tool To A Spindle Cradle For Machining Of Large Pinions Hypoid Gears With Low Shaft Angles Adaptive Control Of A Machining Process Method And Tool For Manufacturing Face Gears Workholding Apparatus For Machine Tool Apparatus For Chamfering And/Or Deburring Of Gears Probe Mechanism For Machine Tool Compensating Arbor Method And Apparatus For Manufacturing Bevel Gears Continuous Method For Manufacturing Face Gears Stroke Length Adjustment Mechanism For A Machine Tool

GLEASON CUTTING TOOLS CORPORATION

Patent Number (Application)	Description	Date Issued (Applied)
7,520,698	Cutting Tool For Gears And Other Toothed Articles	April 21, 2009
7,462,143	Machine Spindle	December 9, 2008
(61/245,309)	Tool Grinding Machine	(September 24, 2009)

GLEASON METROLOGY SYSTEMS CORPORATION

Patent Number (Application)	Description	Date Issued (Applied)
D399,858	Part Checking Machine	October 20, 1998
(61/381,588)	Remote Pendant With Extended User Interface	(September 10, 2010)

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PATENT

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REAFFIRMATION AND AMENDMENT OF CREDIT DOCUMENTS

This REAFFIRMATION AND AMENDMENT OF CREDIT DOCUMENTS (this "Agreement"), dated as of February 28, 2018, is given by GLEASON CORPORATION, a Delaware corporation ("Holdings"), THE GLEASON WORKS, a New York corporation ("GWR"), GLEASON GERMANY (HOLDINGS) GmbH, a corporation organized under the laws of the Federal Republic of Germany ("GGH"), GLEASON SALES CORPORATION, a Delaware corporation ("GSC" and, together with GWR and GGH, the "Borrowers"), ALLIANCE TOOL CORPORATION, a New York corporation ("ATC"), GLEASON SALES (AMERICAS) CORPORATION, a Michigan corporation ("GSAC"), GLEASON CUTTING TOOLS CORPORATION, a Delaware corporation ("GCTC"), GLEASON INTERNATIONAL HOLDINGS, LLC, a Delaware limited liability company ("GIH"), GLEASON METROLOGY SYSTEMS CORPORATION, an Ohio corporation ("GMSC" and, collectively with ATC, GSAC, GCTC and GIH, the "Subsidiary Guarantors" and each individually a "Subsidiary Guarantor"), in favor of MANUFACTURERS AND TRADERS TRUST COMPANY ("M&T"), as administrative agent and collateral agent (together with its successors and assigns in such capacities, "Agent") for each of the Secured Parties (as that term is defined in the Credit Agreement referred to below). Holdings and the Subsidiary Guarantors are collectively referred to herein as the "Guarantors" (and each individually a "Guarantor") and the Borrowers and Guarantors are collectively referred to herein as the "Credit Parties" (and each individually a "Credit Party"). Capitalized terms used herein, unless otherwise defined herein, shall have the meanings given to such terms in the Credit Agreement.

To induce M&T and the other Banks now or hereafter party thereto to enter into that certain Amended and Restated Credit Agreement, dated as of the date hereof, among Holdings, the Borrowers, Agent, and the financial institutions party thereto from time to time as Banks (as the same may be amended, restated, modified, supplemented and/or replaced from time to time, the "Credit Agreement"), each applicable Credit Party has agreed to amend the applicable Credit Document identified on Schedule A hereto (as amended, modified or supplemented through the date hereof, as amended hereby and as may be further amended, restated or otherwise modified from time to time, each a "Credit Document") and to reaffirm each such Credit Party's obligations, covenants and agreements contained in the applicable Credit Document as set forth herein.

NOW THEREFORE, for good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, the parties hereto hereby agree as follows:

- 1. Each Credit Document is hereby amended as follows:
- (a) each reference to "Obligations" and "Secured Obligations" shall have the meanings set forth for such terms in the Credit Agreement;
- (b) each reference to M&T shall mean and refer to M&T in its capacity as Administrative Agent and/or Collateral Agent for the Secured Parties under the Credit Agreement; and
- (c) each reference to the Credit Agreement shall mean and refer to the Credit Agreement as defined herein.

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- 2. The Security Agreement is hereby amended as follows:
- (a) Article IX of the Security Agreement is hereby amended to include the following definitions in alphabetical order as follows:

"Closing Date Management Notes" means each of the Management Notes listed on Annex N hereto and in existence on the Closing Date; provided that any Closing Date Management Note shall cease to be a Closing Date Management Note if it is amended to increase the principal amount thereof after the Closing Date.

"Management Note" means any promissory evidencing a loan or advance by an Assignor to an employee, officer or director (or any former employee, officer or director) entered into in compliance with the Credit Agreement.

(b) The definition of "Concentration Account" appearing in Article IX of the Security Agreement is hereby replaced in its entirety with the following:

"Concentration Account" shall mean any Deposit Account other than Deposit Accounts (i) established solely for the purpose of funding payroll and other compensation and benefits to employees, (ii) having an average monthly balance of less than \$100,000 individually or \$300,000 in the aggregate or (iii) maintained solely for the benefit of third parties as cash collateral constituting Permitted Liens for obligations owing to such third parties permitted under the Credit Agreement.

(c) Section 3.6 of the Security Agreement is hereby amended and restated in its entirety to read as follows:

SECTION 3.6 Instruments. As of the date hereof, no amounts payable under or in connection with any of the Collateral are evidenced by any Instrument not covered by the Pledge Agreement or Tangible Chattel Paper, other than such Instruments or Tangible Chattel Paper that has been properly endorsed, assigned and delivered to the Collateral Agent, accompanied by instruments of transfer or assignment duly executed in blank; provided, however, that with respect to (a) Tangible Chattel Paper, only Tangible Chattel Paper not issued in the ordinary course of business need be endorsed, assigned and delivered to the Collateral Agent, (b) checks payable to an Assignor, only checks payable to an Assignor not processed in the ordinary course of business need be endorsed, assigned and delivered to the Collateral Agent, (c) Management Notes, (x) the Closing Date Management Notes need not be endorsed, assigned and delivered to the Collateral Agent and (y) any Management Notes owned or acquired by any Assignor after the Closing Date having a stated principal amount (or Dollar Equivalent thereof in the case of Management Note denominated in a currency other than Dollars) equal to or less than \$5,000,000 need not be endorsed, assigned and delivered to the Collateral Agent so long as the aggregate stated principal amount (using the Dollar Equivalent to the extent appropriate) of all such Management Notes in this subparagraph (c)(y) not delivered pursuant hereto is equal to or less than \$5,000,000, and (d) other Instruments, Instruments having a stated principal amount (or Dollar Equivalent thereof in the case of an Instrument denominated in a currency other than Dollars) equal to or less than \$500,000 need not be endorsed, assigned and

delivered to the Collateral Agent so long as the aggregate stated principal amount (using the Dollar Equivalent to the extent appropriate) of all such Instruments in this subparagraph (c) not delivered pursuant hereto is equal to or less than \$500,000. If any Assignor owns or acquires any Instrument constituting Collateral and not covered by the Pledge Agreement, such Assignor will within 10 Business Days thereafter notify the Collateral Agent thereof, and upon request by the Collateral Agent will promptly deliver such Instrument (subject to the exceptions set forth in the first sentence of this Section 3.6) to the Collateral Agent appropriately endorsed to the order of the Collateral Agent as further security hereunder. Notwithstanding anything to the contrary in this Section 3.6, each Assignor shall be required to endorse, assign and deliver any Instrument or Tangible Chattel Paper to the Collateral Agent upon the request of the Collateral Agent when an Event of Default has occurred and is continuing.

- (d) The Table of Contents is hereby amended to include a reference to Annex N immediately after the reference to Annex M therein to read as follows:
 - "Annex N Closing Date Management Notes"
- 3. The Pledge Agreement is hereby amended as follows:
- (a) Section 2 of the Pledge Agreement is hereby amended to include the following definitions in alphabetical order as follows:

"Closing Date Management Notes" means each of the Management Notes listed on Annex D hereto described therein as "Management Notes" and in existence on the Closing Date; provided that any Closing Date Management Note shall cease to be a Closing Date Management Note if it is amended to increase the principal amount thereof after the Closing Date.

"Management Note" means any Note evidencing a loan or advance by a Pledgor to an employee, officer or director (or any former employee, officer or director) entered into in compliance with the Credit Agreement.

- (b) Section 3.2(a)(i) of the Pledge Agreement is hereby amended and restated in its entirety to read as follows:
 - (i) with respect to a Certificated Security (other than (x) a Certificated Security credited on the books of a Clearing Corporation and (y) any Certificated Securities owned by any Pledgor (other than Certificated Securities representing Capital Stock or other equity interests in its Subsidiaries) in any Person evidencing equity interests in such Person with a value of less than \$4,000,000) or any Note, such Pledgor shall physically deliver such Certificated Security or Note to the Pledgee, indorsed to the Pledgee or indorsed in blank, subject, in the case of Notes, to Section 3.2(a)(v) of this Agreement;
- (c) Section 3.2(a)(v) of the Pledge Agreement is hereby amended and restated in its entirety to read as follows:

- with respect to any Note, physical delivery of such Note to the Pledgee, (v) indorsed to the Pledgee or indorsed in blank, provided that (A) with respect to any Management Note, physical delivery of such Note to the Pledgee indorsed to the Pledgee or indorsed in blank (x) shall not be required with respect to any Closing Date Management Note and (y) with respect to any Management Note owned or acquired by a Pledgor after the Closing Date, such Pledgor shall not be required to deliver any such Management Note having a stated principal amount (or Dollar Equivalent thereof in the case of a Note denominated in a currency other than Dollars) equal to or less than \$5,000,000 so long as the aggregate stated principal amount (using the Dollar Equivalent to the extent appropriate) of all such Management Notes not delivered pursuant to this clause (A)(y) of this proviso is equal to or less than \$5,000,000 and (B) with respect to any other Note not referred to in clause (A), unless specifically requested by the Pledgee, such Pledgor shall not be required to deliver any Note having a stated principal amount (or Dollar Equivalent thereof in the case of a Note denominated in a currency other than Dollars) equal to or less than \$500,000 so long as the aggregate stated principal amount (using the Dollar Equivalent to the extent appropriate) of all such Notes not delivered pursuant to this proviso is equal to or less than \$500,000; and
- (d) Section 3.6 of the Pledge Agreement is hereby amended and restated in its entirety to read as follows:
 - Certain Representations and Warranties Regarding the Collateral. Each 3.6 Pledgor represents and warrants that on the date hereof (i) each Subsidiary of such Pledgor, and the direct ownership thereof, is listed in Annex B hereto; (ii) the Stock (and any warrants or options to purchase Stock) included in the Collateral held by such Pledgor consists of the number and type of shares of the stock (or warrants or options to purchase any stock) of the corporations as described in Annex C hereto; (iii) such Stock included in the Collateral constitutes that percentage of the issued and outstanding capital stock of the issuing corporation as is set forth in Annex C hereto; (iv) the Notes held by such Pledgor consist of the promissory notes described in Annex D hereto where such Pledgor is listed as the lender; (v) the Limited Liability Company Interests included in the Collateral held by such Pledgor consist of the number and type of interests of the Persons described in Annex E hereto; (vi) each such Limited Liability Company Interest included in the Collateral constitutes that percentage of the issued and outstanding equity interest of the issuing Person as set forth in Annex E hereto; (vii) the Partnership Interests included in the Collateral held by such Pledgor consist of the number and type of interests of the Persons described in Annex F hereto; (viii) each such Partnership Interest included in the Collateral constitutes that percentage or portion of the entire partnership interest of the Partnership as set forth in Annex F hereto; (ix) the Pledgor has complied in all material respects with the respective procedure set forth in Section 3.2(a) hereof with respect to each item of Collateral described in Annexes C through \overline{F} hereto; $\overline{(x)}$ on the date hereof, such Pledgor owns no other Collateral consisting of Securities, Stock, Notes, Limited Liability Company Interests or Partnership Interests; (xi) with respect to Certificated Securities and Notes, all certificates, agreements or instruments representing or evidencing such Collateral in existence on the date hereof that, in the case of Certificated Securities are set forth on Annex C hereto, and in the case of Notes any Notes pledged by a Pledgor (subject to Section 3.2(a)(v) hereof), have been delivered to the Pledgee in suitable form for transfer by delivery or accompanied by duly

executed instruments of transfer or assignment in blank and that the Pledgee has a perfected first priority security interest therein; and (xii) the Pledgee has a perfected first priority security interest in all Uncertificated Securities pledged to it hereunder that are in existence on the date hereof.

- 4. The annexes to the Security Agreement are hereby amended and restated in their entirety by the annexes attached hereto as Exhibit A.
- 5. The annexes to the U.S. Pledge Agreement are hereby amended and restated in their entirety by the annexes attached hereto as <u>Exhibit B</u>.
- 6. The schedules to the Patent Security Agreement are hereby amended and restated in their entirety by the schedules attached hereto as <u>Exhibit C</u>.
- 7. The schedules to the Trademark Security Agreement are hereby amended and restated in their entirety by the schedules attached hereto as <u>Exhibit D</u>.
- 8. Each Credit Party hereby reaffirms any grant of security interest contained in any Credit Document (in each case, as amended, supplemented or modified prior to or as of the date hereof) and confirms that any such security interests secure the Secured Obligations. Without limiting such reaffirmation or otherwise affecting any security interest reaffirmed herein, each Credit Party hereby grants to Agent a lien on and security interest in and to the Collateral as such term is defined in the Credit Documents to secure the Secured Obligations.
- 9. Each of the parties hereto hereby:
- (a) acknowledges and agrees that each of the Credit Documents, as amended hereby, is, and shall remain, in full force and effect, in favor of Agent;
- (b) acknowledges and agrees that each of the Credit Documents secures the "Secured Obligations" to the "Secured Parties" under (and as both such terms are defined in) the Credit Agreement; and
- (c) reaffirms all of its obligations, covenants, duties, liabilities and agreements under each of the Credit Documents (as amended hereby), which obligations, covenants, duties, liabilities and agreements remain in full force and effect on a continuous basis, without novation.
- 10. In the event of any clear inconsistency between any term, covenant or condition of this Agreement and/or the Credit Documents and any term, covenant or condition of the Credit Agreement, the provisions of the Credit Agreement shall control and govern.
- 11. This Agreement may be executed in counterparts, each of which shall constitute an original, but all of which when taken together shall constitute a single contract. This Agreement shall become effective when it shall have been executed by Agent and when Agent shall have received the counterparts hereof that bear the signatures of the other parties hereto, and thereafter shall be binding upon and inure to the benefit of the parties hereto and their respective successors and assigns. This Agreement shall be construed and interpreted in accordance with the laws of the State of New York (excluding the laws applicable to conflicts or choice of law). Delivery of an executed

counterpart of a signature page of this Agreement by telecopy or other electronic means including PDF or by email, shall be effective as delivery of a manually executed counterpart of this Agreement.

[Signature Page Follows]

IN WITNESS WHEREOF, the undersigned has executed this Agreement on the date first written above.

GLEASON CORPORATION

Name: John W. Pysnack

Title: Vice President, Finance and Treasurer

THE GLEASON WORKS

Name: John W. Pysnack

Title: Vice President, Finance and Treasurer

GLEASON GERMANY (HOLDINGS) GmbH

Name: Edward J. Perta

Title: Managing Director

GLEASON SALES CORPORATION

Name: John W. Pysnack

Title: Vice President and Treasurer

ALLIANCE TOOL CORPORATION

Vame: John W. Pysnack

Title: Vice President and Treasurer

GLEASON SALES (AMERICAS) CORPORATION

By John W Vy man

Name: John W. Pysnack

Title: Vice President and Treasurer

GLEASON CUTTING TOOLS CORPORATION

Name John W Pyspack

Title: Vice President and Treasurer

GLEASON INTERNATIONAL HOLDINGS, LLC

Name: John W Pysnack

Title: Vice President and Treasurer

GLEASON METROLOGY SYSTEMS CORPORATION

Name: John W. Pysnack

Title: Vice President and Treasurer

EXHIBIT C

Updated Schedules to Patent Security Agreement

(As Attached)

PATENT

REEL: 045482 FRAME: 0192

SCHEDULE A

SCHEDULE OF PATENTS AND PENDING APPLICATIONS

THE GLEASON WORKS

Patent Number (Application)	Description	Date Issued (Applied)
9,868,168	Cutter With Positive Seated Stick Blades For Bevel Gear Cutting	January 16, 2018
9,796,060	Quick-Change Fluid Supply Apparatus For Machining	October 24, 2017
9,796,031	Method For Machining Toothed Workpieces, Machining Unit Therefor And Machine Tool Equipped With Such A Machining Unit	October 24, 2017
9,796,030	Method And Device For Fine Machining A Toothed Workpiece, And Program For Controlling Said Device	October 24, 2017
9,782,848	Swing Motion For Manufacturing Non-Generated Bevel Gears With End Relief	October 10, 2017
9,649,707	Slide Rolling Process For The Generation Of Bevel Gears	May 16, 2017
9,573,211	Active Torque Method Of Lapping Gears	February 21, 2017
9,289,839	Method And Apparatus For Manufacturing Bevel Gears	March 22, 2016
9,278,420	Probe Mechanism For Machine Tool	March 8, 2016
9,216,466	Gear Processing Machine	December 22, 2015
9,192,998	Method For Chamfering Bevel Gears	November 24, 2015
9,186,738	Method And Device For Machining Work Pieces That Rotate Around A Work Piece Axis	November 17, 2015
9,132,493	Continuous Method For Manufacturing Face Gears	September 15, 2015
9,108,258	Method And Tool For Manufacturing Face Gears	August 18, 2015

9,033,625	Bevel Gear Manufacture With Face Cutters Without Swing Motion	May 19, 2015
8,967,926	Manufacturing Bevel Gears	March 3, 2015
8,967,013	Optimization Of Face Cone Element For Spiral Bevel And Hypoid Gears	March 3, 2015
8,961,081	Apparatus For Chamfering And/Or Deburring Of Gears	February 24, 2015
8,899,002	Tray Loader And Method	December 2, 2014
8,833,773	Workholding Apparatus For Workpiece Transfer	September 16, 2014
8,821,216	Method An Device For Removing A Secondary Burr On An End-Cut Work Piece Wheel	September 2, 2014
8,795,028	Magnetic Spindle For Machine Tool	August 5, 2014
8,790,159	Variable Rate Method Of Machining Gears	July 20, 2014
8,777,230	Device For Securing A Tool To A Spindle	July 15, 2014
8,714,536	Cradle For Machining Of Large Pinions	May 6, 2014
8,684,6371	Arrangement To Connect A Tool Wheel And A Tool Holding Fixture	April 1, 2014
8,660,684	Adaptive Control Of A Machining Process	February 25, 2014
8,573,087	Hypoid Gears With Low Shaft Angles	November 5, 2013
8,561,277	Runout Compensation On Machine Tools	October 22, 2013
8,277,285	Method Of Maintaining A Constant Grinding Process	October 2, 2012
8,267,624	Full Point Width Cutter	September 18, 2012
8,182,313	Carriage Arrangement For A Machine Tool	May 22, 2012
7,886,415	Machine Tool	February 15, 2011
7,836,803	Quick-Adjust Draw Rod Positioning Nut	November 23, 2010

¹ Patent not renewed. Expires 04/01/2018.

7,748,718	Expandable Mandrel	July 6, 2010
7,682,222	Variable Rate Method Of Grinding Gears	March 23, 2010
7,651,383	Method Of Lapping Gears	January 26, 2010
7,553,115	Gear Testing and Lapping Machine	June 30, 2009
7,462,092	Method Of Finishing Bevel Gears To Produce A Diffuse Surface Structure	December 9, 2008
7,364,391	Manufacturing Straight Bevel Gears	April 29, 2008
7,228,643	Method Of Gaging On Gear Lapping And Testing Machines	June 12, 2007
7,182,674	Coolant Delivery Apparatus For Machine Tool	February 27, 2007
7,118,459	Dressing Tool For Profiling The Tip Area Of A Grinding Wheel For Threaded Wheel Grinding	October 10, 2006
6,939,214	Honing Wheel Having Internal Gearing	September 6, 2005
6,824,449	Clamping Assembly	November 30, 2004
6,808,440	Method Of Grinding Cutting Blades	October 26, 2004
6,712,566	Machine And Method For Producing Bevel Gears	March 30, 2004
6,676,337	Tool For Chamfering And Deburring The End Face Tooth Edges Of Gear Wheels	January 14, 2004
6,390,893	Method For Machining Gears	May 21, 2002
6,217,409	Threaded Grinding Wheel And Method Of Dressing	April 17, 2001
6,120,355	Method And Apparatus For Lapping Gears	September 19, 2000
6,120,217	Cutting Tool For Producing Toothed Articles	September 19, 2000
(14/439,789)	Gear Cutter With Radial Adjustability Of Stick Blades	(April 30, 2015)
(14/440,666)	Dual-Hand Cutter Head For Gear Manufacture	(May 5, 2015)

(14/442,736)	Gear Cutter With Radial Adjustability Of Rectangular Stick Blades	(May 14, 2015)
(14/781,753)	Skiving of Cylindrical Gears	(October 1, 2015)
(14/911,055)	Peripheral Cutting Tool Utilizing Stick Blades	(February 9, 2016)
(14/912,411)	Internal Bevel Gear	(February 17, 2016)
(15/221,993)	Heat Treatment Of Steel Parts, Particularly Friction-Welded Steel Parts	(July 28, 2016)
(15/308,102)	Method Of Grinding Gears	(November 1, 2016)
(15/504,432)	Machine Spindle With Ejecting Means	(February 16, 2017)
(15/509,509)	Axial Hob With Multi-Revolution Cutting Teeth	(March 8, 2017)
(15/531,008)	Cutter Build And Truing Machine	(May 26, 2017)
(15/544,931)	Lock Spring And Cutting Tool Having A Lock Spring	(July 20, 2017)
(15/545,433)	Compensation Device And Clamping Device For Workpieces Equipped With A Compensation Device Of This Type	(July 21, 2017)
(15/572,520)	Bevel Gear Flank Surface Structure Shift	(November 8, 2017)
(62/222,501)	Three-Face Blade Compatibility	(September 23, 2015)
(62/221,351)	Method And Tool For Manufacturing Spiral Tooth Face Couplings	(September 21, 2015)
(62/261,026)	Additive Manufacturing Of Gears	(November 30, 2015)
(62/289,470)	Mono-Blade Bevel Gear Cutting Tool	(February 1, 2016)
(62/319,555)	Workholding For Gears	(April 7. 2016)
(62/338,653)	Topland Chamfering Of Gears	(May 19, 2016)
(62/377,834)	Power Skiving Pressure Angle Correction Without Tool Geometry Change	August 22, 2016
(62/422,066)	Cutter With Positive Seated Round Blade Sticks For Bevel Gear Cutting	November 15, 2016

(62/480,581)	Sinusoidal-Parabolic Hybrid Motion Error	(April 3, 2017)
(62/531,917)	Bevel Gear Cutter And Blade Consolidation	(July 13, 2017)
(29/596,229)	Gear Manufacturing Machine	(March 7, 2017)
(29/596,233)	Gear Manufacturing Machine	(March 7, 2017)
(29/596,236)	Gear Metrology Machine	(March 7, 2017)
(29/625,243)	Display Screen Or Portions Thereof With Graphical User Interface	(November 8, 2017)
(29/625,262)	Display Screen Or Portions Thereof With Graphical User Interface	(November 8, 2017)

GLEASON CUTTING TOOLS CORPORATION

Patent Number (Application)	Description	Date Issued (Applied)
8,801,503	Spindle For Solid Bevel Cutter Grinding Machine	August 12, 2014
(15/572,916)	Tools With Removable Information Device	(November 9, 2017)

GLEASON METROLOGY SYSTEMS CORPORATION

Patent Number (Application)	Description	Date Issued (Applied)
9,329,595	Remote Pendant With Extended User Interface	May 3, 2016
(15/524,443)	Machine Vibration Isolation	(May 4, 2017)
(62/301,772)	Measurement Of Worm Gears	(May 1, 2016)
(62/385,520)	Measurement Of Toothed Articles Utilizing Multiple Sensors	(September 9, 2016)
(62/575,631)	Measurement Of Toothed articles On A Composite Machine Tester Platform Utilizing A Non-Contact Sensor	(October 23, 2017)

PATENT REEL: 045482 FRAME: 0197

RECORDED: 03/01/2018