

UNITED STATES SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

FORM 10-Q

(Mark One)

QUARTERLY REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934

For the quarterly period ended September 30, 2023

OR

TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934

For the transition period from _____ to _____
Commission File Number: 001-36383

Five9, Inc.

(Exact Name of Registrant as Specified in Its Charter)

Delaware

(State or Other Jurisdiction of
Incorporation or Organization)

94-3394123

(I.R.S. Employer
Identification No.)

3001 Bishop Drive, Suite 350
San Ramon, CA 94583

(Address of Principal Executive Offices) (Zip Code)

(925) 201-2000

(Registrant's Telephone Number, Including Area Code)

Securities registered pursuant to Section 12(b) of the Act:

Title of Each Class	Trading Symbol(s)	Name of Each Exchange on Which Registered
Common stock, par value \$0.001 per share	FIVN	The NASDAQ Global Market

Indicate by check mark whether the registrant: (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes: No:

Indicate by check mark whether the registrant has submitted electronically every Interactive Data File required to be submitted pursuant to Rule 405 of Regulation S-T (§232.405 of this chapter) during the preceding 12 months (or for such shorter period that the registrant was required to submit such files). Yes: No:

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, a smaller reporting company, or an emerging growth company. See definitions of "large accelerated filer," "accelerated filer," "smaller reporting company", and "emerging growth company" in Rule 12b-2 of the Exchange Act.

Large Accelerated Filer	<input checked="" type="checkbox"/>	Accelerated Filer	<input type="checkbox"/>
Non-accelerated filer	<input type="checkbox"/>	Smaller Reporting Company	<input type="checkbox"/>
	(Do not check if a smaller reporting Company)	Emerging Growth Company	<input type="checkbox"/>

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 13(a) of the Exchange Act. Yes: No:

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act). Yes: No:

As of October 27, 2023, there were 72,695,935 shares of the Registrant's common stock, par value \$0.001 per share, outstanding.

FIVE9, INC.

FORM 10-Q

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SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS

This Quarterly Report on Form 10-Q contains forward-looking statements within the meaning of Section 27A of the Securities Act of 1933 and Section 21E of the Securities Exchange Act of 1934, which involve substantial risks and uncertainties. These statements reflect the current views of our senior management with respect to our future events, strategies and financial trends and performance. These forward-looking statements include statements with respect to our business, expenses, strategies, losses, growth plans, product and client initiatives, market growth projections, and our industry. Statements that include the words “expect,” “intend,” “plan,” “believe,” “project,” “forecast,” “estimate,” “may,” “should,” “anticipate” and similar statements of a future or forward-looking nature identify forward-looking statements for purposes of the federal securities laws or otherwise.

Forward-looking statements address matters that involve risks and uncertainties. Accordingly, there are or will be important factors that could cause our actual results to differ materially from those indicated in these statements. These factors include the information under the caption “Risk Factors” set forth in Part 1, Item 1A, of our Annual Report on Form 10-K for the fiscal year ended December 31, 2022 and Part II, Item 1A, of this Quarterly Report, which we encourage you to carefully read, and include the following:

- adverse economic conditions, including the impact of macroeconomic deterioration, including continuing inflation, increased interest rates, supply chain disruptions, decreased economic output and fluctuations in currency rates, the impact of the Russia-Ukraine conflict, the impact of the conflict in Israel, and other factors, that may continue to harm our business;
- if we are unable to attract new clients or sell additional services and functionality to our existing clients, our revenue and revenue growth will be harmed;
- if our existing clients terminate their subscriptions or reduce their subscriptions and related usage, or fail to grow subscriptions at the rate they have in the past or that we might expect, our revenues and gross margins will be harmed, and we will be required to spend more money to grow our client base;
- because a significant percentage of our revenue is derived from existing clients, downturns or upturns in new sales will not be immediately reflected in our operating results and may be difficult to discern;
- we have established, and are continuing to increase, our network of technology solution brokers and resellers to sell our solution; our failure to effectively develop, manage, and maintain this network could materially harm our revenues;
- our quarterly and annual results may fluctuate significantly, including as a result of the timing and success of new product and feature introductions by us, may not fully reflect the underlying performance of our business and may result in decreases in the price of our common stock;
- our recent rapid growth may not be indicative of our future growth, and even if we continue to grow rapidly, we may fail to manage our growth effectively;
- failure to adequately retain and expand our sales force will impede our growth;
- if we fail to manage our technical operations infrastructure, our existing clients may experience service outages, our new clients may experience delays in the deployment of our solution and we could be subject to, among other things, claims for credits or damages;
- further development of our AI solutions may not be successful and may result in reputational harm and our future operating results could be materially harmed;
- the AI technology and features incorporated into our solution include new and evolving technologies that may present both legal and business risks;
- the use of AI by our workforce may present risks to our business;
- our growth depends in part on the success of our strategic relationships with third parties and our failure to successfully maintain, grow and manage these relationships could harm our business;
- the markets in which we participate involve a high number of competitors that are continuing to increase, and if we do not compete effectively, our operating results could be harmed;
- we continue to expand our international operations, which exposes us to significant macroeconomic and other risks;
- security breaches and improper access to or disclosure of our data or our clients’ data, or other cyber attacks on our systems, could result in litigation and regulatory risk, harm our reputation, our business or financial results;
- we may acquire other companies, or technologies or be the target of strategic transactions, or be impacted by transactions by other companies, which could divert our management’s attention, result in additional

dilution to our stockholders or use a significant amount of our cash resources and otherwise disrupt our operations and harm our operating results;

- we sell our solution to larger organizations that require longer sales and implementation cycles and often demand more configuration and integration services or customized features and functions that we may not offer, any of which could delay or prevent these sales and harm our growth rates, business and operating results;
- we rely on third-party telecommunications and internet service providers to provide our clients and their customers with telecommunication services and connectivity to our cloud contact center software and any failure by these service providers to provide reliable services could cause us to lose clients and subject us to claims for credits or damages, among other things;
- we have a history of losses and we may be unable to achieve or sustain profitability;
- the contact center software solutions market is subject to rapid technological change, and we must develop and sell incremental and new cloud contact center solutions, which we refer to as our solution, in order to maintain and grow our business;
- our stock price has been volatile, may continue to be volatile and may decline, including due to factors beyond our control;
- we may not be able to secure additional financing on favorable terms, or at all, to meet our future capital needs;
- failure to comply with laws and regulations could harm our business and our reputation; and
- we may not have sufficient cash to service our convertible senior notes and repay such notes, if required.

The foregoing factors should not be construed as exhaustive and should be read together with the other cautionary statements included in, or incorporated into, this report. If one or more of these or other risks or uncertainties materialize, or if our underlying assumptions prove to be incorrect, our actual results may differ materially from what we anticipate. You should not place undue reliance on our forward-looking statements. Any forward-looking statements you read in this report reflect our views only as of the date of this report with respect to future events and are subject to these and other risks, uncertainties and assumptions relating to our operations, results of operations, growth strategy and liquidity. We undertake no obligation to update any forward-looking statements made in this report to reflect events or circumstances after the date of this report or to reflect new information or the occurrence of unanticipated events, except as required by law.

PART I. FINANCIAL INFORMATION

ITEM 1. Financial Statements

FIVE9, INC.
CONDENSED CONSOLIDATED BALANCE SHEETS
(In thousands, except per share data)

	September 30, 2023 (Unaudited)	December 31, 2022
ASSETS		
Current assets:		
Cash and cash equivalents	\$ 127,828	\$ 180,520
Marketable investments	572,462	433,743
Accounts receivable, net	94,436	87,494
Prepaid expenses and other current assets	37,627	29,711
Deferred contract acquisition costs, net	58,320	47,242
Total current assets	890,673	778,710
Property and equipment, net	102,029	101,221
Operating lease right-of-use assets	41,522	44,120
Finance lease right-of-use assets	4,612	—
Intangible assets, net	41,469	28,192
Goodwill	227,412	165,420
Marketable investments	—	885
Other assets	16,603	11,057
Deferred contract acquisition costs, net — less current portion	132,124	114,880
Total assets	\$ 1,456,444	\$ 1,244,485
LIABILITIES AND STOCKHOLDERS' EQUITY		
Current liabilities:		
Accounts payable	\$ 28,528	\$ 23,629
Accrued and other current liabilities	59,511	53,092
Operating lease liabilities	11,454	10,626
Finance lease liabilities	1,617	—
Accrued federal fees	3,336	2,471
Sales tax liabilities	2,965	2,973
Deferred revenue	64,565	57,816
Convertible senior notes	—	169
Total current liabilities	171,976	150,776
Convertible senior notes — less current portion	741,169	738,376
Sales tax liabilities — less current portion	919	899
Operating lease liabilities — less current portion	38,336	41,389
Finance lease liabilities — less current portion	3,048	—
Other long-term liabilities	7,126	3,080
Total liabilities	962,574	934,520
Commitments and contingencies (Note 10)		
Stockholders' equity:		
Common stock	73	71
Additional paid-in capital	887,087	635,668
Accumulated other comprehensive loss	(798)	(2,688)
Accumulated deficit	(392,492)	(323,086)
Total stockholders' equity	493,870	309,965
Total liabilities and stockholders' equity	\$ 1,456,444	\$ 1,244,485

See accompanying notes to the unaudited condensed consolidated financial statements.

FIVE9, INC.

CONDENSED CONSOLIDATED STATEMENTS OF OPERATIONS
AND COMPREHENSIVE LOSS

(Unaudited, in thousands, except per share data)

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Revenue	\$ 230,105	\$ 198,342	\$ 671,426	\$ 570,501
Cost of revenue	111,080	94,111	320,197	271,207
Gross profit	119,025	104,231	351,229	299,294
Operating expenses:				
Research and development	40,391	34,113	117,709	104,929
Sales and marketing	73,366	67,353	223,757	196,062
General and administrative	31,006	24,496	89,741	72,634
Total operating expenses	144,763	125,962	431,207	373,625
Loss from operations	(25,738)	(21,731)	(79,978)	(74,331)
Other income (expense), net:				
Interest expense	(1,972)	(1,879)	(5,683)	(5,606)
Interest income and other	8,233	982	18,477	2,107
Total other income (expense), net	6,261	(897)	12,794	(3,499)
Loss before income taxes	(19,477)	(22,628)	(67,184)	(77,830)
Provision for income taxes	942	579	2,222	3,167
Net loss	\$ (20,419)	\$ (23,207)	\$ (69,406)	\$ (80,997)
Net loss per share:				
Basic and diluted	\$ (0.28)	\$ (0.33)	\$ (0.97)	\$ (1.16)
Shares used in computing net loss per share:				
Basic and diluted	72,356	70,232	71,751	69,656
Comprehensive Loss:				
Net loss	\$ (20,419)	\$ (23,207)	\$ (69,406)	\$ (80,997)
Other comprehensive income (loss)	599	433	1,890	(3,814)
Comprehensive loss	\$ (19,820)	\$ (22,774)	\$ (67,516)	\$ (84,811)

See accompanying notes to the unaudited condensed consolidated financial statements.

FIVE9, INC.

CONDENSED CONSOLIDATED STATEMENT OF STOCKHOLDERS' EQUITY
(Unaudited, in thousands)

	Common Stock		Additional Paid-In Capital	Accumulated Other Comprehensive Income (Loss)	Accumulated Deficit	Total Stockholders' Equity
	Shares	Amount				
Balance as of June 30, 2022	70,090	\$ 70	\$ 535,592	\$ (4,534)	\$ (286,226)	\$ 244,902
Issuance of common stock upon partial conversion of the 2023 convertible senior notes	—	—	(16)	—	—	(16)
Partial unwind of capped calls and retirement of common stock related to the 2023 convertible senior notes	—	—	5	—	—	5
Issuance of common stock upon exercise of stock options	68	—	2,353	—	—	2,353
Issuance of common stock upon vesting of restricted stock units	345	1	—	—	—	1
Stock-based compensation	—	—	44,974	—	—	44,974
Other comprehensive income	—	—	—	433	—	433
Net loss	—	—	—	—	(23,207)	(23,207)
Balance as of September 30, 2022	<u>70,503</u>	<u>\$ 71</u>	<u>\$ 582,908</u>	<u>\$ (4,101)</u>	<u>\$ (309,433)</u>	<u>\$ 269,445</u>
Balance as of June 30, 2023	72,180	\$ 72	\$ 832,197	\$ (1,397)	\$ (372,073)	\$ 458,799
Issuance of common stock upon exercise of stock options	57	—	1,334	—	—	1,334
Issuance of common stock upon vesting of restricted stock units	459	1	(1)	—	—	—
Issuance of common stock under ESPP	—	—	—	—	—	—
Stock-based compensation	—	—	53,557	—	—	53,557
Other comprehensive income	—	—	—	599	—	599
Net loss	—	—	—	—	(20,419)	(20,419)
Balance as of September 30, 2023	<u>72,696</u>	<u>\$ 73</u>	<u>\$ 887,087</u>	<u>\$ (798)</u>	<u>\$ (392,492)</u>	<u>\$ 493,870</u>

See accompanying notes to the unaudited condensed consolidated financial statements.

FIVE9, INC.

CONDENSED CONSOLIDATED STATEMENT OF STOCKHOLDERS' EQUITY

(Unaudited, in thousands)

	Common Stock		Additional Paid-In Capital	Accumulated Other Comprehensive Income (Loss)	Accumulated Deficit	Total Stockholders' Equity
	Shares	Amount				
Balance as of December 31, 2021	68,488	\$ 68	\$ 439,787	\$ (287)	\$ (228,436)	\$ 211,132
Issuance of common stock upon partial conversion of the 2023 convertible senior notes	574	—	(275)	—	—	(275)
Partial unwind of capped calls and retirement of common stock related to the 2023 convertible senior notes	(119)	—	8	—	—	8
Issuance of common stock upon exercise of stock options	419	1	5,357	—	—	5,358
Issuance of common stock upon vesting of restricted stock units	1,044	2	—	—	—	2
Issuance of common stock under ESPP	97	—	8,338	—	—	8,338
Stock-based compensation	—	—	129,693	—	—	129,693
Other comprehensive loss	—	—	—	(3,814)	—	(3,814)
Net loss	—	—	—	—	(80,997)	(80,997)
Balance as of September 30, 2022	<u>70,503</u>	<u>\$ 71</u>	<u>\$ 582,908</u>	<u>\$ (4,101)</u>	<u>\$ (309,433)</u>	<u>\$ 269,445</u>
Balance as of December 31, 2022	71,047	\$ 71	\$ 635,668	\$ (2,688)	\$ (323,086)	\$ 309,965
Issuance of common stock upon partial conversion of the 2023 convertible senior notes	2	—	—	—	—	—
Settlement at maturity of the outstanding capped calls and retirement of common stock related to the 2023 convertible senior notes	(371)	—	74,453	—	—	74,453
Issuance of common stock upon exercise of stock options	436	—	8,315	—	—	8,315
Issuance of common stock upon vesting of restricted stock units	1,378	2	(1)	—	—	1
Issuance of common stock under ESPP	204	—	9,444	—	—	9,444
Stock-based compensation	—	—	159,208	—	—	159,208
Other comprehensive income	—	—	—	1,890	—	1,890
Net loss	—	—	—	—	(69,406)	(69,406)
Balance as of September 30, 2023	<u>72,696</u>	<u>\$ 73</u>	<u>\$ 887,087</u>	<u>\$ (798)</u>	<u>\$ (392,492)</u>	<u>\$ 493,870</u>

See accompanying notes to the unaudited condensed consolidated financial statements.

FIVE9, INC.
CONDENSED CONSOLIDATED STATEMENTS OF CASH FLOWS
(Unaudited, in thousands)

	Nine Months Ended	
	September 30, 2023	September 30, 2022
Cash flows from operating activities:		
Net loss	\$ (69,406)	\$ (80,997)
Adjustments to reconcile net loss to net cash provided by operating activities:		
Depreciation and amortization	35,553	33,650
Amortization of operating lease right-of-use assets	9,234	7,491
Amortization of deferred contract acquisition costs	40,088	29,245
(Accretion of discount) amortization of premium on marketable investments	(7,684)	1,006
Provision for credit losses	795	812
Stock-based compensation	156,721	128,682
Amortization of discount and issuance costs on convertible senior notes	2,793	2,796
Deferred taxes	438	2,076
Change in fair of value of contingent consideration	—	260
Payment of contingent consideration liability in excess of acquisition-date fair value	—	(5,900)
Other	669	503
Changes in operating assets and liabilities:		
Accounts receivable	(6,661)	(5,337)
Prepaid expenses and other current assets	(6,537)	(2,228)
Deferred contract acquisition costs	(68,410)	(62,835)
Other assets	(4,892)	(213)
Accounts payable	5,562	1,008
Accrued and other current liabilities	(2,006)	796
Accrued federal fees and sales tax liabilities	877	(2,001)
Deferred revenue	1,544	9,519
Other liabilities	3,616	(2,208)
Net cash provided by operating activities	92,294	56,125
Cash flows from investing activities:		
Purchases of marketable investments	(544,713)	(250,278)
Proceeds from sales of marketable investments	971	600
Proceeds from maturities of marketable investments	415,117	321,311
Purchases of property and equipment	(19,941)	(46,028)
Capitalization of software development costs	(5,820)	(2,420)
Cash paid to acquire Aceyus	(80,588)	—
Payments of initial direct costs	—	(282)
Cash paid for an equity investment in a privately-held company	—	(2,000)
Net cash (used in) provided by investing activities	(234,974)	20,903
Cash flows from financing activities:		
Repayment of outstanding 2023 convertible senior notes at maturity	(169)	—
Cash received from the settlement at maturity of the outstanding capped calls associated with the 2023 convertible senior notes	74,453	—
Repurchase of a portion of 2023 convertible senior notes, net of costs	—	(34,057)
Proceeds from exercise of common stock options	8,315	5,358
Proceeds from sale of common stock under ESPP	9,444	8,338
Payment of contingent consideration liability up to acquisition-date fair value	—	(18,100)
Payment of holdback related to an acquisition	(500)	—
Payments of finance leases	(496)	—
Net cash provided by (used in) financing activities	91,047	(38,461)
Net (decrease) increase in cash, cash equivalents and restricted cash	(51,633)	38,567
Cash, cash equivalents and restricted cash:		
Beginning of period	180,987	91,391
End of period	\$ 129,354	\$ 129,958
Supplemental disclosures of cash flow data:		
Cash paid for interest	\$ 1,956	\$ 1,870
Cash paid for income taxes	\$ 1,124	\$ 932
Non-cash investing and financing activities:		
Equipment and software purchased and unpaid at period-end	\$ 11,419	\$ 13,372
Capitalization of leasehold improvements and furniture and fixtures through non-cash lease incentive	\$ —	\$ 109
Acquisition and related transaction costs accrued at period-end	\$ 330	\$ —
Stock-based compensation included in capitalized software development costs	\$ 2,487	\$ 1,011
Reconciliation of Cash, Cash Equivalents and Restricted Cash to the Condensed Consolidated Balance Sheets - Beginning of Period:		
Cash and cash equivalents	\$ 180,520	\$ 90,878
Restricted cash in other assets	467	513
Total cash, cash equivalents and restricted cash	\$ 180,987	\$ 91,391
Reconciliation of Cash, Cash Equivalents and Restricted Cash to the Condensed Consolidated Balance Sheets - End of Period:		
Cash and cash equivalents	\$ 127,828	\$ 129,492
Restricted cash in other assets	1,526	466
Total cash, cash equivalents and restricted cash	\$ 129,354	\$ 129,958

See accompanying notes to the unaudited condensed consolidated financial statements.

FIVE9, INC.

Notes to Condensed Consolidated Financial Statements (Unaudited)

1. Description of Business and Summary of Significant Accounting Policies

Five9, Inc. and its wholly-owned subsidiaries (the “Company”) is a provider of cloud software for contact centers. The Company was incorporated in Delaware in 2001 and is headquartered in San Ramon, California. The Company has offices in Europe, Asia and Australia, which primarily provide research, development, sales, marketing, and client support services.

Basis of Presentation

The accompanying condensed consolidated financial statements have been prepared in accordance with generally accepted accounting principles in the United States (“GAAP”) and applicable rules and regulations of the Securities and Exchange Commission (“SEC”) regarding interim financial reporting. Certain information and note disclosures normally included in financial statements prepared in accordance with GAAP have been condensed or omitted pursuant to such rules and regulations. Therefore, these condensed consolidated financial statements should be read in conjunction with the consolidated financial statements and notes included in the Company’s Annual Report on Form 10-K for the year ended December 31, 2022. In the opinion of management, the condensed consolidated financial statements reflect all adjustments, which are normal and recurring in nature, necessary for fair financial statement presentation. All intercompany transactions and balances have been eliminated in consolidation.

Use of Estimates

The preparation of condensed consolidated financial statements in accordance with GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the condensed consolidated financial statements and the reported amounts of revenue and expenses during the reporting period. The significant estimates made by management affect revenue and related reserves, as well as the fair value of assets acquired and liabilities assumed through business combinations. Management periodically evaluates such estimates and they are adjusted prospectively based upon such periodic evaluation. Actual results could differ from those estimates.

Significant Accounting Policies

There have been no material changes from the significant accounting policies previously disclosed in Part II, Item 8, of the Company’s Annual Report on Form 10-K for the fiscal year ended December 31, 2022 as filed with the SEC on February 24, 2023.

Recent Accounting Pronouncements Not Yet Effective

The Company has reviewed or is in the process of evaluating all issued, but not yet effective, accounting pronouncements and does not believe the future adoption of any such accounting pronouncements will cause a material impact on its condensed consolidated financial position, operating results or statements of cash flows.

2. Revenue

Contract Balances

The following table provides information about accounts receivable, net, deferred contract acquisition costs, net, contract assets and contract liabilities from contracts with customers (in thousands):

	September 30, 2023	December 31, 2022
Accounts receivable, net	\$ 94,436	\$ 87,494
Deferred contract acquisition costs, net:		
Current	\$ 58,320	\$ 47,242
Non-current	132,124	114,880
Total deferred contract acquisition costs, net	\$ 190,444	\$ 162,122
Contract assets and contract liabilities:		
Contract assets (included in prepaid expenses and other current assets)	\$ 2,878	\$ 3,401
Contract liabilities (deferred revenue)	(64,565)	(57,816)
Noncurrent contract liabilities (deferred revenue) (included in other long-term liabilities)	(1,558)	(1,178)
Net contract liabilities	\$ (63,245)	\$ (55,593)

The Company receives payments from customers based upon billing cycles. Invoice payment terms are usually 30 days or less. Accounts receivable are recorded when the right to consideration becomes unconditional.

Deferred contract acquisition costs are recorded when incurred and are amortized over an estimated customer benefit period of five years.

The Company's contract assets consist of unbilled amounts typically resulting from professional services revenue recognition when it exceeds the total amounts billed to the customer. The Company's contract liabilities consist of advance payments and billings in excess of revenue recognized.

In the three and nine months ended September 30, 2023, the Company recognized revenue of \$4.3 million and \$45.8 million, respectively, related to its contract liabilities at December 31, 2022.

Remaining Performance Obligations

As of September 30, 2023, the aggregate amount of the total transaction price allocated in contracts with original duration of greater than one year to the remaining performance obligations was \$1,046.3 million. The Company expects to recognize revenue on approximately three-fourths of the remaining performance obligations over the next 24 months, with the balance recognized thereafter. The Company excludes amounts for remaining performance obligations that are part of contracts with an original expected duration of one year or less. Such remaining performance obligations represent unsatisfied or partially unsatisfied performance obligations.

3. Investments and Fair Value Measurements

Marketable Investments

The Company's marketable investments have been classified and accounted for as available-for-sale. The Company's intent is that all marketable investments are available for use in its current operations, including marketable investments with maturity dates greater than one year from September 30, 2023. The Company's

marketable investments as of September 30, 2023 and December 31, 2022 were as follows (in thousands):

Short-Term Marketable Investments	September 30, 2023			
	Cost	Gross Unrealized Gains	Gross Unrealized Losses	Fair Value
Certificates of deposit	\$ 1,206	\$ —	\$ —	\$ 1,206
U.S. treasury securities	263,979	10	(903)	263,086
U.S. agency securities	267,458	—	(659)	266,799
Commercial paper	31,412	1	(10)	31,403
Corporate bonds	10,056	—	(88)	9,968
Total	\$ 574,111	\$ 11	\$ (1,660)	\$ 572,462

Short-Term Marketable Investments	December 31, 2022			
	Cost	Gross Unrealized Gains	Gross Unrealized Losses	Fair Value
Certificates of deposit	\$ 747	\$ —	\$ (13)	\$ 734
U.S. treasury securities	186,776	8	(1,382)	185,402
U.S. agency and government-sponsored securities	197,597	29	(1,660)	195,966
Commercial paper	25,386	—	—	25,386
Municipal bonds	22,764	—	(145)	22,619
Corporate bonds	3,658	—	(22)	3,636
Total	\$ 436,928	\$ 37	\$ (3,222)	\$ 433,743

Long-term Marketable Investments	December 31, 2022			
	Cost	Gross Unrealized Gains	Gross Unrealized Losses	Fair Value
U.S. agency securities	\$ 885	\$ —	\$ —	\$ 885
Total	\$ 885	\$ —	\$ —	\$ 885

The following table presents the gross unrealized losses and the fair value for those marketable investments that were in an unrealized loss position for less than 12 months as of September 30, 2023 and December 31, 2022 (in thousands):

	September 30, 2023		December 31, 2022	
	Gross Unrealized Losses	Fair Value	Gross Unrealized Losses	Fair Value
Certificates of deposit	\$ —	\$ —	\$ (13)	\$ 734
U.S. treasury securities	(903)	123,889	(1,382)	126,534
U.S. agency securities	(659)	266,183	(1,660)	172,458
Commercial paper	(10)	28,284	—	—
Municipal bonds	—	—	(145)	12,623
Corporate bonds	(88)	9,969	(22)	3,636
Total	\$ (1,660)	\$ 428,325	\$ (3,222)	\$ 315,985

Although the Company had certain available-for-sale debt securities in an unrealized loss position as of September 30, 2023, no impairment loss was recorded since it did not intend to sell them, did not anticipate a need to sell them, and the decline in fair value was not due to any credit-related factors.

The amortized cost and fair value of the Company's marketable investments by contractual maturity as of September 30, 2023 were as follows (in thousands):

	Cost	Fair Value
Due within one year	\$ 456,826	\$ 456,282
Due after one year through two years	117,285	116,180
Total	\$ 574,111	\$ 572,462

Fair Value Measurements

The Company carries cash equivalents and marketable investments at fair value. Fair value is based on the price that would be received from selling an asset or paid to transfer a liability in an orderly transaction between market participants at the measurement date. Fair value is estimated by applying the following hierarchy, which prioritizes the inputs used to measure fair value into three levels and bases the categorization within the hierarchy upon the lowest level of input that is available and significant to the fair value measurement:

Level 1 — Observable inputs, which include unadjusted quoted prices in active markets for identical assets or liabilities.

Level 2 — Observable inputs other than Level 1 inputs, such as quoted prices in markets that are not active, or other inputs that are observable or can be corroborated by observable market data for substantially the full term of the assets or liabilities.

Level 3 — Unobservable inputs that are supported by little or no market activity and that are based on management's assumptions, including fair value measurements determined by using pricing models, discounted cash flow methodologies or similar techniques.

The Company determined the fair value of its Level 1 financial instruments, which are traded in active markets, using quoted market prices for identical instruments.

Marketable investments classified within Level 2 of the fair value hierarchy are valued based on other observable inputs, including broker or dealer quotations or alternative pricing sources. When quoted prices in active markets for identical assets or liabilities are not available, the Company relies on non-binding quotes from its investment managers, which are based on proprietary valuation models of independent pricing services. These models generally use inputs such as observable market data, quoted market prices for similar instruments, historical pricing trends of a security as relative to its peers. To validate the fair value determination provided by its investment managers, the Company reviews the pricing movement in the context of overall market trends and trading information from its investment managers. The Company performs routine procedures such as comparing prices obtained from independent source to ensure that appropriate fair values are recorded.

The following tables set forth the Company's assets measured at fair value by level within the fair value hierarchy (in thousands):

	September 30, 2023			
	Level 1	Level 2	Level 3	Total
Assets				
Cash equivalents				
Money market funds	\$ 34,026	\$ —	\$ —	\$ 34,026
Certificates of deposit	—	249	—	249
U.S. treasury securities	11,970	—	—	11,970
Total cash equivalents	<u>\$ 45,996</u>	<u>\$ 249</u>	<u>\$ —</u>	<u>\$ 46,245</u>
Marketable investments				
Certificates of deposit	\$ —	\$ 1,206	\$ —	\$ 1,206
U.S. treasury securities	263,086	—	—	263,086
U.S. agency securities and government sponsored securities	—	266,799	—	266,799
Commercial paper	—	31,403	—	31,403
Corporate bonds	—	9,968	—	9,968
Total marketable investments	<u>\$ 263,086</u>	<u>\$ 309,376</u>	<u>\$ —</u>	<u>\$ 572,462</u>

	December 31, 2022			
	Level 1	Level 2	Level 3	Total
Assets				
Cash equivalents				
Money market funds	\$ 37,560	\$ —	\$ —	\$ 37,560
U.S. treasury securities	19,700	—	—	19,700
Total cash equivalents	<u>\$ 57,260</u>	<u>\$ —</u>	<u>\$ —</u>	<u>\$ 57,260</u>
Marketable investments (short and long-term)				
Certificates of deposit	\$ —	\$ 734	\$ —	\$ 734
U.S. treasury securities	185,402	—	—	185,402
U.S. agency and government-sponsored securities	—	196,851	—	196,851
Commercial paper	—	25,386	—	25,386
Municipal bonds	—	22,619	—	22,619
Corporate bonds	—	3,636	—	3,636
Total marketable investments	<u>\$ 185,402</u>	<u>\$ 249,226</u>	<u>\$ —</u>	<u>\$ 434,628</u>

As of December 31, 2022, the estimated fair value of the Company's outstanding 2023 convertible senior notes was \$0.3 million. The 2023 convertible senior notes matured on May 1, 2023. As of September 30, 2023 and December 31, 2022, the estimated fair value of the Company's outstanding 2025 convertible senior notes was \$698.5 million and \$687.1 million, respectively. The fair values were determined based on the quoted price of the convertible senior notes in an inactive market on the last trading day of the reporting period and have been classified as Level 2 in the fair value hierarchy. See Note 6 for further information on the Company's convertible senior notes.

In February 2022, the Company made a \$2.0 million equity investment in a privately-held company that it does not have the ability to exercise significant influence over. The Company elected the measurement alternative for an equity security without a readily determinable fair value. Accordingly, this investment is accounted for at its cost minus impairment, if any, and is classified within Level 3. If the Company identifies observable price changes in orderly transactions for such investment or a similar investment, it will measure the investment at fair value as of the date that the observable transactions or events occurred.

Except for the \$2.0 million equity investment described above, there were no assets or liabilities measured at fair value on a non-recurring basis as of September 30, 2023 and December 31, 2022.

The fair value of the Company's other financial instruments, including accounts receivable, accounts payable and other current liabilities, approximate their carrying value due to the relatively short maturity of those instruments. The carrying amounts of the Company's operating and finance leases approximate their fair value, which is the present value of expected future cash payments based on assumptions about current interest rates and the creditworthiness of the Company.

4. Financial Statement Components

Cash and cash equivalents consisted of the following (in thousands):

	September 30, 2023	December 31, 2022
Cash	\$ 81,583	\$ 123,260
Certificates of deposit	249	—
Money market funds	34,026	37,560
U.S. treasury securities	11,970	19,700
Total cash and cash equivalents	<u>\$ 127,828</u>	<u>\$ 180,520</u>

Accounts receivable, net consisted of the following (in thousands):

	September 30, 2023	December 31, 2022
Trade accounts receivable	\$ 83,122	\$ 77,621
Unbilled trade accounts receivable, net of advance client deposits	11,567	10,135
Allowance for credit losses	(253)	(262)
Accounts receivable, net	<u>\$ 94,436</u>	<u>\$ 87,494</u>

Prepaid expenses and other current assets consisted of the following (in thousands):

	September 30, 2023	December 31, 2022
Prepaid expenses	\$ 26,325	\$ 17,151
Other current assets	8,424	9,159
Contract assets	2,878	3,401
Prepaid expenses and other current assets	<u>\$ 37,627</u>	<u>\$ 29,711</u>

Property and equipment, net consisted of the following (in thousands):

	September 30, 2023	December 31, 2022
Computer and network equipment	\$ 149,051	\$ 148,789
Computer software	56,498	50,955
Internal-use software development costs	14,419	6,111
Furniture and fixtures	4,690	3,326
Leasehold improvements	6,042	6,574
Property and equipment	230,700	215,755
Accumulated depreciation and amortization	(128,671)	(114,534)
Property and equipment, net	<u>\$ 102,029</u>	<u>\$ 101,221</u>

Depreciation and amortization expense associated with property and equipment was \$9.3 million and \$26.7 million for the three and nine months ended September 30, 2023, respectively. Depreciation and amortization expense associated with property and equipment was \$8.3 million and \$24.8 million for the three and nine months ended September 30, 2022, respectively.

Property and equipment capitalized under finance lease obligations consists primarily of computer and network equipment and was immaterial as of September 30, 2023 and December 31, 2022.

Other assets consisted of the following (in thousands):

	September 30, 2023	December 31, 2022
Other assets	\$ 11,069	\$ 5,081
Equity investment in a privately-held company	2,000	2,000
Deferred tax assets	3,534	3,976
Total	<u>\$ 16,603</u>	<u>\$ 11,057</u>

Accrued and other current liabilities consisted of the following (in thousands):

	September 30, 2023	December 31, 2022
Accrued expenses	\$ 20,051	\$ 19,343
Accrued compensation and benefits	39,460	33,749
Accrued and other current liabilities	<u>\$ 59,511</u>	<u>\$ 53,092</u>

Other long-term liabilities consisted of the following (in thousands):

	September 30, 2023	December 31, 2022
Deferred revenue	\$ 1,558	\$ 1,178
Deferred tax liabilities	463	157
Other long-term liabilities	5,105	1,745
Other long-term liabilities	<u>\$ 7,126</u>	<u>\$ 3,080</u>

5. Goodwill and Intangible Assets

Goodwill of \$62.6 million and intangible assets of \$22.0 million were recorded as a result of the Company's acquisition of Aceyus, Inc. ("Aceyus") in August 2023. See Note 13 for further details. The following table summarizes the activity in the Company's goodwill and intangible asset balances during the nine months ended September 30, 2023 (in thousands):

	Goodwill	Intangible Assets
Beginning of the period, December 31, 2022	\$ 165,420	\$ 28,192
Addition (Aceyus)	61,992	22,150
Amortization	—	(8,873)
End of the period, September 30, 2023	<u>\$ 227,412</u>	<u>\$ 41,469</u>

The components of intangible assets were as follows (in thousands):

	September 30, 2023				December 31, 2022			
	Gross Carrying Amount	Accumulated Amortization	Net Carrying Amount	Weighted Average Remaining Amortization period (Years)	Gross Carrying Amount	Accumulated Amortization	Net Carrying Amount	Weighted Average Remaining Amortization period (Years)
Developed technology	\$ 75,314	\$ (37,472)	\$ 37,842	5.3	\$ 56,214	\$ (28,881)	\$ 27,333	3.2
Acquired workforce	470	(470)	—	0.0	470	(470)	—	0.0
Customer relationships	4,150	(1,002)	3,148	4.3	1,600	(741)	859	2.7
Trademarks	1,000	(521)	479	2.9	500	(500)	—	0.0
Total	<u>\$ 80,934</u>	<u>\$ (39,465)</u>	<u>\$ 41,469</u>	5.2	<u>\$ 58,784</u>	<u>\$ (30,592)</u>	<u>\$ 28,192</u>	3.2

Amortization expense related to intangible assets was \$3.2 million and \$8.9 million for the three and nine months ended September 30, 2023, respectively. Amortization expense related to intangible assets was \$2.9 million and \$8.8 million for the three and nine months ended September 30, 2022, respectively.

As of September 30, 2023, the expected future amortization expense for intangible assets was as follows (in thousands):

Period	Expected Future Amortization Expense
Remaining 2023	\$ 3,143
2024	10,591
2025	8,660
2026	7,201
2027	2,898
Thereafter	8,976
Total	<u>\$ 41,469</u>

6. Debt

2025 Convertible Senior Notes and Related Capped Call Transactions

In May and June 2020, the Company issued \$747.5 million aggregate principal amount of 2025 convertible senior notes in a private offering, which aggregate principal amount included the exercise in full of the initial purchasers' option to purchase up to an additional \$97.5 million principal amount of the 2025 convertible senior notes. The 2025 convertible senior notes mature on June 1, 2025 and bear interest at a fixed rate of 0.500% per

annum, payable semiannually in arrears on June 1 and December 1 of each year, beginning on December 1, 2020. The total net proceeds from the issuance of the 2025 convertible senior notes, after deducting initial purchasers' discounts and commissions and estimated debt issuance costs, were approximately \$728.8 million.

Each \$1,000 principal amount of the 2025 convertible senior notes is initially convertible into 7.4437 shares of the Company's common stock (the "2025 Conversion Option"), which is equivalent to an initial conversion price of approximately \$134.34 per share of common stock, subject to adjustment upon the occurrence of specified events. The initial conversion price represents a premium of approximately 30% to the \$103.34 per share closing price of the Company's common stock on The Nasdaq Global Market on May 21, 2020. The 2025 convertible senior notes are convertible, in multiples of \$1,000 principal amount, at the option of the holders prior to the close of business on the business day immediately preceding March 1, 2025, only under the following circumstances: (1) during any calendar quarter commencing after the calendar quarter ending on September 30, 2020 (and only during such calendar quarter), if the last reported sale price of the Company's common stock for at least 20 trading days (whether or not consecutive) during a period of 30 consecutive trading days ending on, and including, the last trading day of the immediately preceding calendar quarter is greater than or equal to 130% of the conversion price on each applicable trading day; (2) during the five business day period after any five consecutive trading day period (the "2025 Measurement Period") in which the trading price (as defined in the 2025 Indenture governing the 2025 convertible senior notes) per \$1,000 principal amount of the 2025 convertible senior notes for each trading day of the 2025 Measurement Period was less than 98% of the product of the last reported sale price of the Company's common stock and the conversion rate in effect on each such trading day; (3) if the Company calls any or all of the 2025 convertible senior notes for redemption, at any time prior to the close of business on the second scheduled trading day immediately preceding the redemption date; or (4) upon the occurrence of specified corporate events. On or after March 1, 2025 until the close of business on the second scheduled trading day immediately preceding the maturity date, holders may convert all or any portion of their 2025 convertible senior notes, in multiples of \$1,000 principal amount, at the option of the holder regardless of the foregoing circumstances.

Upon conversion, the Company will pay or deliver, as the case may be, cash, shares of the Company's common stock or a combination of cash and shares of the Company's common stock, at the Company's election. If the Company undergoes a fundamental change (as defined in the indenture governing the 2025 convertible senior notes), subject to certain conditions, holders may require the Company to repurchase for cash all or any portion of their 2025 convertible senior notes, in principal amounts of \$1,000 or a multiple thereof, at a fundamental change repurchase price equal to 100% of the principal amount of the 2025 convertible senior notes to be repurchased, plus accrued and unpaid interest, if any, to, but excluding, the fundamental change repurchase date. In addition, following certain corporate events or if the Company issues a notice of redemption, it will, under certain circumstances, increase the conversion rate for holders who elect to convert their notes in connection with such corporate event or during the relevant redemption period.

There have been no changes to the initial conversion price of the 2025 convertible senior notes since issuance. The closing market price of the Company's common stock of \$64.30 per share on September 29, 2023, the last trading day during the three months ended September 30, 2023, was below \$174.64 per share, which represents 130% of the initial conversion price of \$134.34 per share. Additionally, the last reported sale price of the Company's common stock for at least 20 trading days (whether or not consecutive) during a period of 30 consecutive trading days ending on, and including, the last trading day, September 29, 2023, was not greater than or equal to 130% of the initial conversion price. As such, during the three months ended September 30, 2023, the conditions allowing holders of the 2025 convertible senior notes to convert were not met. The 2025 convertible senior notes are therefore not convertible during the three months ending December 31, 2023.

The 2025 convertible senior notes became redeemable at the Company's option on June 6, 2023. The Company may redeem for cash all or any portion of the 2025 convertible senior notes, at its option, prior to March 1, 2025, if the last reported sale price of its common stock has been at least 130% of the conversion price then in effect for at least 20 trading days (whether or not consecutive) during any 30 consecutive trading day period (including the last trading day of such period) ending not more than two trading days immediately preceding the date on which the Company provides notice of redemption at a redemption price equal to 100% of the principal amount of the 2025 convertible senior notes to be redeemed, plus accrued and unpaid interest, if any, to, but excluding, the redemption date. No sinking fund is provided for the 2025 convertible senior notes. During the three months ended September 30, 2023, the conditions allowing the Company to redeem for cash all or any portion of the 2025 convertible senior notes were not met.

The 2025 convertible senior notes are the Company's senior unsecured obligations and rank senior in right of payment to any of the Company's indebtedness that is expressly subordinated in right of payment to the 2025 convertible senior notes; equal in right of payment to any of the Company's unsecured indebtedness that is not so subordinated; effectively junior in right of payment to any of the Company's secured indebtedness to the extent of

the value of the assets securing such indebtedness; and structurally junior to all indebtedness and other liabilities (including trade payables) of the Company's subsidiaries.

The net carrying amount of the 2025 convertible senior notes as of September 30, 2023 and as of December 31, 2022 was as follows (in thousands):

	September 30, 2023	December 31, 2022
Principal	\$ 747,500	\$ 747,500
Unamortized issuance costs	(6,331)	(9,124)
Net carrying amount	<u>\$ 741,169</u>	<u>\$ 738,376</u>

Interest expense related to the 2025 convertible senior notes was as follows (in thousands):

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Contractual interest expense	\$ 934	\$ 935	\$ 2,803	\$ 2,804
Amortization of issuance costs	954	944	2,793	2,765
Total interest expense	<u>\$ 1,888</u>	<u>\$ 1,879</u>	<u>\$ 5,596</u>	<u>\$ 5,569</u>

In connection with the issuance of the 2025 convertible senior notes, the Company entered into privately negotiated capped call transactions (the "2025 Capped Call Transactions") with certain financial institutions. The initial cap price of the 2025 Capped Call Transactions was \$206.68 per share and is subject to certain adjustments under the terms of the 2025 Capped Call Transactions. The 2025 Capped Call Transactions cover, subject to anti-dilution adjustments, approximately 5.6 million shares of the Company's common stock.

2023 Convertible Senior Notes and Related Capped Call Transactions

In May 2018, the Company issued \$258.8 million aggregate principal amount of the 2023 convertible senior notes in a private offering. The total net proceeds from the offering, after deducting initial purchasers' discounts and commissions and estimated debt issuance costs, was approximately \$250.8 million.

In May 2020, the Company used part of the net proceeds from the issuance of the 2025 convertible senior notes to repurchase, exchange or otherwise retire approximately \$181.0 million aggregate principal amount of the 2023 convertible senior notes in privately-negotiated transactions for aggregate consideration of \$449.6 million, consisting of \$181.0 million in cash and 2,723,581 shares of the Company's common stock (the "2023 Note Repurchase Transactions").

The 2023 convertible senior notes matured on May 1, 2023, and were settled in a combination of cash and shares of the Company's common stock. Prior to maturity, the 2023 convertible senior notes bore interest at a fixed rate of 0.125% per annum, payable semiannually in arrears on May 1 and November 1 of each year. There were no changes to the 2023 convertible senior notes' initial conversion price of approximately \$40.82 per share of common stock since issuance.

The net carrying amount of the 2023 convertible senior notes as of December 31, 2022 was \$0.2 million. There were no 2023 convertible senior notes outstanding as of September 30, 2023. Interest expense related to the 2023 convertible senior notes was immaterial for both the three and nine months ended September 30, 2023 and the three and nine months ended September 30, 2022.

In connection with the issuance of the 2023 convertible senior notes, the Company entered into privately negotiated capped call transactions (the "2023 Capped Call Transactions") with certain financial institutions. The initial cap price of the 2023 Capped Call Transactions was \$62.80 per share. The 2023 Capped Call Transactions covered approximately 6.3 million shares of the Company's common stock. Upon maturity, the outstanding capped calls associated with the repurchase, early settlements and settlements at maturity of \$194.7 million of the 2023 convertible senior notes were settled, which resulted in the Company receiving 370,877 shares of the Company's common stock and \$74.5 million.

7. Stockholders' Equity

Capital Structure

Common Stock

The Company is authorized to issue 450,000,000 shares of common stock with a par value of \$0.001 per share. As of September 30, 2023 and December 31, 2022, the Company had 72,695,935 and 71,047,179 shares of common stock issued and outstanding, respectively.

Preferred Stock

The Company is authorized to designate and issue up to 5,000,000 shares of preferred stock with a par value of \$0.001 per share in one or more series without stockholder approval and to fix the rights, preferences, privileges and restrictions thereof. As of September 30, 2023 and December 31, 2022, there were no shares of preferred stock issued and outstanding.

Common Stock Reserved for Future Issuance

Shares of common stock reserved for future issuance related to outstanding equity awards and employee equity incentive plans as of September 30, 2023 were as follows (in thousands):

	September 30, 2023
Stock options outstanding	973
RSUs (including PRSUs) outstanding	4,378
Shares available for future grant under 2014 Plan	15,816
Shares available for future issuance under ESPP	4,076
Total shares of common stock reserved	25,243

Stock Options

A summary of the Company's stock option activity during the nine months ended September 30, 2023 is as follows (in thousands, except per share data):

	Number of Shares	Weighted Average Exercise Price	Weighted Average Remaining Contractual Life (Years)	Aggregate Intrinsic Value
Outstanding as of December 31, 2022	1,481	\$ 47.75		
Options granted	—	—		
Options exercised	(436)	19.07		
Options forfeited or expired	(72)	141.71		
Outstanding as of September 30, 2023	973	\$ 53.66	4.8	\$ 27,290

The aggregate intrinsic value amounts are computed based on the difference between the exercise price of the stock options and the fair market value of the Company's common stock of \$64.30 per share as of September 30, 2023 for all in-the-money stock options outstanding.

Restricted Stock Units (including Performance-Based Restricted Stock Units)

A summary of the Company's restricted stock unit ("RSU") activity (including Performance-Based Restricted Stock Units "PRSUs") during the nine months ended September 30, 2023 is as follows (in thousands, except per

share data):

	Number of Shares	Weighted Average Grant Date Fair Value Per Share
Outstanding as of December 31, 2022	3,718	\$ 103.55
RSUs granted ⁽¹⁾	2,388	68.25
RSUs vested and released	(1,378)	101.30
RSUs forfeited or canceled	(350)	103.11
Outstanding as of September 30, 2023	4,378	85.06

(1) Includes 35,921 PRSUs granted during the nine months ended September 30, 2023.

PRSUs with Market and Service Conditions In 2022, the Company granted 284,282 PRSUs subject to market and service conditions (“market-based PRSUs”) with a grant date fair value of \$30.6 million as part of its annual grant of equity incentive awards to certain executives and in connection with the appointment of Michael Burkland as its new Chief Executive Officer. During the nine months ended September 30, 2023, the Company granted an additional 35,921 market-based PRSUs with a grant date fair value of \$3.1 million. The amount that may be earned pursuant to the market-based PRSUs ranges from 0% to 200% of the target number based on the Company’s relative total shareholder return (“RTSR”) performance as compared to the companies in the S&P Software and Services Select Index during three one-year performance periods. One-third of the total market-based PRSUs may be earned and settled in shares following the end of each one-year performance period based on RTSR performance and subject to continued employment through the payment date, but the amount initially paid for the first two one-year performance periods is limited to 100% of the target amount for such years, and any market-based PRSUs resulting from above-target performance in those first two years will be paid following the end of the final one-year performance period, subject to the executive’s continued employment through the payment date. If the Company’s absolute total shareholder return for any performance period is negative, then no more than 100% of the target amount of market-based PRSUs for such period may be earned. If an executive’s employment with the Company terminates before the end of the final one-year performance period due to death or disability, 100% (if due to death) or 50% (if due to disability) of the unvested market-based PRSUs may be earned subject to ultimate RTSR performance in each remaining performance period. Upon a qualifying termination of employment in connection with a change in control of the Company, the unvested market-based PRSUs will vest on a double-trigger basis (i) at the target level for the market-based PRSUs granted to certain executives, excluding Michael Burkland, subject to the 2022-2024 performance period, and (ii) for the market-based PRSUs granted to certain executives, including Michael Burkland, subject to the 2023-2025 performance period, (a) at the target level for the uncompleted portions of the performance periods and (b) at the actual level of performance measured through the date of the change in control of the Company, based on the price per share paid in such change in control. The fair value of the market-based PRSUs is determined on their grant date using a Monte Carlo Simulation model based upon assumptions presented below. The Company recognizes the fair value of the market-based PRSUs ratably over their requisite service period.

During the first quarter of 2023, the Company certified the performance results for the 2022 measurement period for the market-based PRSUs subject to the 2022-2024 performance period. Under the market-based PRSU agreements, the TSR payout percentage ranges from 0% to 200%, with a 50% payout at the 25th TSR percentile (threshold), 100% payout at the 55th TSR percentile (target), 200% payout at the 90th percentile or greater (maximum) and no payout below the threshold performance level. The Company determined that its actual total shareholder return was -52.64% for 2022, and that its relative total shareholder return ranking was in the 30.2 percentile relative to companies in the S&P Software & Services Select Index, which resulted in a payout percentage of 58.7% of target.

PRSUs with Revenue and Service Conditions In 2022, the Company granted 66,167 PRSUs subject to revenue-based performance and service conditions (“revenue-based PRSUs”) with a grant date fair value of \$6.6 million. The amount of revenue-based PRSUs that may be earned will be determined based on achievement of two quarterly revenue goals. One third of the revenue-based PRSUs may be earned based on achievement of the first revenue target and, if achieved, will vest in four quarterly installments, with the first installment occurring on the date such achievement is certified, subject to the executive’s continuous service through the applicable vesting dates. Two thirds of the revenue-based PRSUs may be earned based on achievement of the second revenue target and, if achieved, will vest in eight quarterly installments, with the first installment occurring on the date such achievement is certified, subject to the executive’s continuous service through the applicable vesting dates. The revenue-based PRSUs are otherwise on the Company’s standard award terms for its market-based PRSUs. The Company certified that the first revenue target was achieved at September 30, 2023, and thus recognized the related stock-based compensation expense through this period. The Company, however, concluded that, as of September 30, 2023, the second revenue target was not probable of achievement, and thus did not recognize related stock-based

compensation expense through this period. The Company will reassess the probability of the achievement of the performance conditions at each reporting period and a cumulative catch-up adjustment will be recorded to stock-based compensation cost for any change in the probability assessment.

Stock-Based Compensation

Stock-based compensation expense was as follows (in thousands):

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Cost of revenue	\$ 9,856	\$ 8,329	\$ 29,077	\$ 24,659
Research and development	12,980	10,603	38,375	32,567
Sales and marketing	16,404	15,761	50,840	44,148
General and administrative	13,371	9,810	38,429	27,308
Total stock-based compensation expense	\$ 52,611	\$ 44,503	156,721	128,682

As of September 30, 2023, unrecognized stock-based compensation expense by award type and expected weighted-average recognition periods are summarized in the following table (in thousands, except years).

	Stock Option	RSU (excluding PRSUs)	PRSU	ESPP
Unrecognized stock-based compensation expense	\$ 5,781	\$ 315,047	\$ 16,228	\$ 557
Weighted-average amortization period	1.7 years	2.7 years	1.9 years	0.1 years

The weighted-average assumptions used to value stock options granted during the periods presented were as follows:

Stock Options	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Expected term (years)	—	—	—	6.0
Volatility	—	—	—	46.0 %
Risk-free interest rate	—	—	—	1.8 %
Dividend yield ⁽¹⁾	—	—	—	—

The weighted-average assumptions used to value PRSUs with market conditions granted during the periods presented were as follows:

PRSUs (Market Conditions)	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Closing price of common stock as of grant date	—	—	\$ 68.15	\$110.00
Expected term (years)	—	—	2.84	2.84
Volatility	—	—	51.1 %	48.8 %
Risk-free interest rate	—	—	4.5 %	1.6 %
Dividend yield ⁽¹⁾	—	—	—	—

(1) The Company has not paid, and does not anticipate paying, cash dividends on its shares of common stock. Accordingly, the expected dividend yield is zero.

8. Net Loss Per Share

Basic net loss per share is calculated by dividing net loss by the weighted average number of shares of common stock outstanding during the period, and excludes any dilutive effects of employee stock-based awards and potential shares upon conversion of the convertible senior notes. Diluted net loss per share is computed giving effect

to all potentially dilutive shares of common stock, including common stock issuable upon exercise of stock options, vesting of RSUs and PRSUs, and shares of common stock issuable upon conversion of convertible senior notes. As the Company had net losses for the three and nine months ended September 30, 2023 and 2022, all potentially issuable shares of common stock were determined to be anti-dilutive.

The following table presents the calculation of basic and diluted net loss per share (in thousands, except per share data):

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Net loss	\$ (20,419)	\$ (23,207)	\$ (69,406)	\$ (80,997)
Weighted-average shares used in computing basic and diluted net loss per share	72,356	70,232	71,751	69,656
Basic and diluted net loss per share	\$ (0.28)	\$ (0.33)	\$ (0.97)	\$ (1.16)

The following securities were excluded from the calculation of diluted net loss per share because their effect would have been anti-dilutive (in thousands):

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Stock options	973	1,626	973	1,626
RSUs (includes PRSUs)	4,378	2,879	4,378	2,879
Convertible senior notes	5,564	5,569	5,566	5,725
Total	10,915	10,074	10,917	10,230

The Company used the if-converted method for calculating any potential dilutive effect of its convertible senior notes for the three and nine months ended September 30, 2023 and 2022. Under this method, the Company calculates diluted earnings per share under both the cash and share settlement assumptions to determine which is more dilutive. If share settlement is more dilutive, the Company calculates diluted earnings per share assuming that all of the convertible senior notes were converted solely into shares of common stock at the beginning of the reporting period. The potential impact upon the conversion of the convertible senior notes were excluded from the calculation of diluted net loss per share for the three and nine months ended September 30, 2023 and 2022 because the effect would have been anti-dilutive.

9. Income Taxes

The provision for income taxes for the three and nine months ended September 30, 2023 was approximately \$0.9 million and \$2.2 million, respectively. The provision for income taxes for the three and nine months ended September 30, 2022 was approximately \$0.6 million and \$3.2 million, respectively.

The provision for income taxes for the three and nine months ended September 30, 2023 consisted primarily of current U.S. state tax expense due to the lack of available net operating losses to offset the taxable income generated and foreign income tax expense due to the Company's intercompany cost-plus operating model. The provision for income taxes for the three and nine months ended September 30, 2022 consisted primarily of foreign deferred income tax expense from the intercompany sale of the Company's Australian intellectual property to the United States, U.S. state current income tax expense and foreign current income tax expense.

For the three and nine months ended September 30, 2023, the provision for income taxes differed from the statutory amount primarily due to domestic state income taxes, foreign income taxes and the Company realizing no benefit for current year domestic losses due to maintaining a full valuation allowance against its domestic net deferred tax assets. For the three and nine months ended September 30, 2022, the provision for income taxes differed from the statutory amount primarily due to state and foreign income taxes and the Company realizing no benefit for current year domestic losses due to maintaining a full valuation allowance against its domestic net deferred tax assets.

The realization of tax benefits from deferred tax assets is dependent upon future levels of taxable income, of an appropriate character, in the periods the items are expected to be deductible or taxable. Based on the available objective evidence, the Company does not believe it is more likely than not that the domestic net deferred tax assets

will be realizable. Accordingly, the Company has provided a full valuation allowance against the domestic net deferred tax assets as of September 30, 2023 and December 31, 2022. The Company intends to maintain the remaining valuation allowance until sufficient positive evidence exists to support a reversal of, or decrease in, the valuation allowance. During the three and nine months ended September 30, 2023, there were no material changes to the total amount of unrecognized tax benefits.

10. Commitments and Contingencies

Commitments

The Company's principal commitments consist of future payment obligations under its convertible senior notes, finance leases to finance data centers and other computer and networking equipment, operating leases for office facilities, cloud services and software and maintenance agreements, and agreements with third parties to provide co-location hosting and telecommunication services. These commitments as of December 31, 2022 are disclosed in the Company's Annual Report on Form 10-K for the year ended December 31, 2022, and material updates to these commitments during the nine months ended September 30, 2023 are disclosed herein, including in this Note 10 and in Note 12.

As of September 30, 2023, the Company's commitments under various co-location hosting and telecommunications agreements totaled \$17.0 million for terms ranging up to 57 months. These agreements require the Company to make monthly payments over the service term in exchange for certain network services.

As of September 30, 2023, the Company had outstanding cloud services and software and maintenance agreement commitments totaling \$72.0 million, of which \$10.9 million is expected to be paid in the remainder of 2023, \$40.7 million is expected to be paid in 2024, \$19.9 million is expected to be paid in 2025, and the remaining \$0.5 million is expected to be paid in 2026.

As of September 30, 2023, \$747.5 million of aggregate principal of the 2025 convertible senior notes was outstanding and is due on June 1, 2025. As of September 30, 2023, no 2023 convertible senior notes were outstanding. See Note 6 for more information concerning the convertible senior notes.

Legal Matters

The Company is involved in various legal and regulatory matters arising in the normal course of business. In management's opinion, resolution of these matters is not expected to have a material impact on the Company's consolidated results of operations, cash flows, or its financial position. However, due to the uncertain nature of legal matters, an unfavorable resolution of a matter could materially affect the Company's future consolidated results of operations, cash flows or financial position in a particular period. The Company expenses legal fees as incurred.

Indemnification Agreements

In the ordinary course of business, the Company enters into agreements of varying scope and terms pursuant to which it agrees to indemnify clients, vendors, lessors, business partners and other parties with respect to certain matters, including, but not limited to, losses arising out of breach of such agreements, including breach of security, services to be provided by the Company or from intellectual property infringement claims made by third parties. In addition, the Company has entered into indemnification agreements with its directors, officers and certain employees that requires it, among other things, to indemnify them against certain liabilities that may arise by reason of their status or service as directors, officers or employees. There are no claims that the Company is aware of that could have a material effect on the consolidated balance sheets, consolidated statements of operations and comprehensive loss, or consolidated statements of cash flows.

11. Geographical Information

The following table summarizes revenues by geographic region based on client billing address (in thousands):

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
United States	\$ 205,679	\$ 179,306	\$ 599,259	\$ 517,537
International	24,426	19,036	72,167	52,964
Total revenue	\$ 230,105	\$ 198,342	\$ 671,426	\$ 570,501

The following table summarizes total property and equipment, net in the respective locations (in thousands):

	September 30, 2023	December 31, 2022
United States	\$ 95,175	\$ 92,659
International	6,854	8,562
Property and equipment, net	\$ 102,029	\$ 101,221

12. Leases

The Company has leases for offices, data centers and computer and networking equipment that expire at various dates through 2031. The Company's leases have remaining terms of one to eight years, some of the leases include a Company option to extend the leases for up to one to five years, and some of the leases include the option to terminate the leases upon 30-days' notice. The Company does not separate lease and non-lease components for real estate operating leases.

The components of lease expenses were as follows (in thousands):

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Operating lease cost	\$ 3,360	\$ 2,969	\$ 10,112	\$ 8,738
Finance lease cost:				
Amortization of right-of-use assets	\$ 491	\$ 141	\$ 570	\$ 609
Interest on finance lease liabilities	83	—	83	—
Total finance lease cost	\$ 574	\$ 141	\$ 653	\$ 609

Supplemental cash flow information related to leases was as follows (in thousands):

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Cash paid for amounts included in the measurement of lease liabilities:				
Operating cash used in operating leases	\$ (3,001)	\$ (2,951)	\$ (8,319)	\$ (8,489)
Financing cash used in finance leases	(496)	—	(496)	—
Right of use assets obtained in exchange for lease obligations:				
Operating leases	795	3,899	6,273	4,483
Finance leases	2,936	—	5,103	—

Supplemental balance sheet information related to leases was as follows (in thousands):

	September 30, 2023	December 31, 2022
Operating leases		
Operating lease right-of-use assets	\$ 41,522	\$ 44,120
Operating lease liabilities	\$ 11,454	\$ 10,626
Operating lease liabilities — less current portion	38,336	41,389
Total operating lease liabilities	\$ 49,790	\$ 52,015
Finance leases		
Finance lease right-of-use assets	\$ 4,612	\$ —
Property and equipment, gross	\$ 29,974	\$ 36,282
Less: accumulated depreciation and amortization	(29,974)	(36,203)
Property and equipment, net	\$ —	\$ 79
Finance lease liabilities	\$ 1,617	\$ —
Finance lease liabilities — less current portion	3,048	—
Total finance lease liabilities	\$ 4,665	\$ —

Weighted average remaining terms were as follows (in years):

	September 30, 2023	December 31, 2022
Weighted average remaining lease term		
Operating leases	5.8	6.4
Finance leases	2.8	—

Weighted average discount rates were as follows:

	September 30, 2023	December 31, 2022
Weighted average discount rate		
Operating leases	3.7 %	3.4 %
Finance leases	6.0 %	— %

Maturities of lease liabilities were as follows (in thousands):

Year Ending December 31,	Operating Leases	Finance Leases
Remaining 2023	\$ 3,709	\$ 452
2024	11,997	1,848
2025	9,171	1,848
2026	6,987	898
2027	5,929	—
Thereafter	17,281	—
Total future minimum lease payments	55,074	5,046
Less: imputed interest	(5,284)	(381)
Total	\$ 49,790	\$ 4,665

13. Acquisition

Aceyus

On August 14, 2023, the Company acquired all of the issued and outstanding shares of capital stock of Aceyus for total cash consideration of approximately \$82.0 million. This acquisition, which was accounted for as a business combination, is intended to accelerate the Company's ability to capitalize on two business opportunities, namely facilitating the migration of large enterprise customers from on-premise to cloud and leveraging contextual data to deliver personalized experiences throughout the customer journey, including using this contextual data in the Company's AI & Automation solutions.

The excess of the purchase price over identifiable intangible assets and net tangible assets in the amount of \$62.0 million was allocated to goodwill, which is not deductible for tax purposes. The fair values assigned to assets acquired and liabilities assumed are based on management's best estimates and assumptions as of the acquisition date and are considered preliminary pending finalization of valuation analyses pertaining to intangible assets acquired, liabilities assumed and tax liabilities assumed. During the measurement period, which may be up to one year from the acquisition date, the Company may record adjustments to the fair value of these tangible and intangible assets acquired and liabilities assumed, with the corresponding offset to goodwill. The following table presents the preliminary allocation of the purchase price at the acquisition date (in thousands):

Cash	\$	1,424
Tangible assets acquired		383
Other assets acquired		3,002
Acquired technology		19,100
Customer relationships		2,550
Trademarks		500
Goodwill		61,992
Total assets acquired		88,951
Liabilities assumed		(6,939)
Total	\$	82,012

The acquired technology, customer relationships, and trademarks will be amortized on a straight-line basis over their estimated useful lives of eight years, five years, and three years, respectively. The Company used the income approach to estimate the fair value of intangible assets acquired.

In connection with this acquisition, the Company incurred total acquisition-related transaction costs of \$0.7 million and \$1.6 million during the three and nine months ended September 30, 2023, respectively, that have been expensed as incurred and included in general and administrative expenses in the consolidated statements of operations and comprehensive loss.

The results of operations of this acquisition are included in the accompanying consolidated statements of operations and comprehensive loss from the date of acquisition and are not material to the Company's consolidated financial statements.

ITEM 2. Management's Discussion and Analysis of Financial Condition and Results of Operations

You should read the following discussion in conjunction with the condensed consolidated financial statements and notes thereto included elsewhere in this Quarterly Report on Form 10-Q and our Annual Report on Form 10-K for the year ended December 31, 2022.

Overview

We are a pioneer and leading provider of intelligent cloud contact centers with more than 2,500 clients. We believe we achieved this leadership position through our expertise and technology, which has empowered us to help organizations of all sizes transition from legacy on-premise contact center systems to our cloud solution. Our solution, comprised of our Virtual Contact Center, or VCC, cloud platform and applications, allows simultaneous management and optimization of customer interactions across voice, chat, email, web, social media and mobile channels, either directly or through our application programming interfaces, or APIs. Our VCC cloud platform matches each customer interaction with an appropriate agent resource and delivers relevant customer data to the agent in real-time through integrations with adjacent enterprise applications, such as customer relationship management, or CRM, software, to optimize the customer experience and improve agent productivity. Unlike legacy on-premise contact center systems, our solution requires minimal up-front investment, can be rapidly deployed and adjusted depending on our client's requirements.

Since founding our business in 2001, we have focused exclusively on delivering cloud contact center software. We initially targeted smaller contact center opportunities with our telesales team and, over time, invested in expanding the breadth and depth of the functionality of our cloud platform to meet the evolving requirements of our clients. In 2009, we made a strategic decision to expand our market opportunity to include larger contact centers. This decision drove further investments in research and development and the establishment of our field sales team to meet the requirements of these larger contact centers. We believe this shift has helped us diversify our client base, while significantly enhancing our opportunity for future revenue growth. To complement these efforts, we have also focused on building client awareness and driving adoption of our solution through marketing activities, which include internet advertising, digital marketing campaigns, social media, trade shows, industry events, telemarketing and out of home campaigns.

We provide our solution through a SaaS business model with recurring subscriptions. We offer a comprehensive suite of applications delivered on our VCC cloud platform that are designed to enable our clients to manage and optimize interactions across inbound and outbound contact centers. We primarily generate revenue by selling subscriptions and related usage of our VCC cloud platform. We charge our clients monthly subscription fees for access to our solution, primarily based on the number of agent seats, as well as the specific functionalities and applications our clients deploy. We define agent seats as the maximum number of named agents allowed to concurrently access our solution. Our clients typically have more named agents than agent seats, and multiple named agents may use an agent seat, though not simultaneously. Substantially all of our clients purchase both subscriptions and related telephony usage from us. A small percentage of our clients subscribe to our platform but purchase telephony usage directly from wholesale telecommunications service providers. We do not sell telephony usage on a stand-alone basis to any client. The related usage fees are based on the volume of minutes for inbound and outbound interactions. We also offer bundled plans, generally for smaller deployments, where the client is charged a single monthly fixed fee per agent seat that includes both subscription and unlimited usage in the contiguous 48 states and, in some cases, Canada. We offer monthly, annual and multiple-year contracts to our clients, generally with 30 days' notice required for reductions in the number of agent seats. Increases in the number of agent seats can be provisioned almost immediately. Our clients, therefore, are able to adjust the number of agent seats used to meet their changing contact center volume needs. Our larger clients typically choose annual contracts, which generally include an implementation and ramp period of several months. Fixed subscription fees, including bundled plans, are generally billed monthly in advance, while related usage fees are billed in arrears. For each of the three and nine months ended September 30, 2023, subscription and related usage fees accounted for 92% of our revenue. For each the three and nine months ended September 30, 2022, subscription and related usage fees accounted for 90% and 91% of our revenue, respectively. The remainder was comprised of professional services revenue from the implementation and optimization of our solution.

Macroeconomic and Other Factors

We are subject to risks and exposures, including those caused by adverse economic conditions, including macroeconomic deterioration, the Russia-Ukraine conflict and the conflict in Israel.

Macroeconomic factors include the global economic slowdown, continuing inflation, increased interest rates, supply chain disruptions, decreased economic output and fluctuations in currency exchange rates. We continuously

monitor the direct and indirect impacts of these circumstances on our business and financial results, as well as the overall global economy and geopolitical landscape. While the implications of macroeconomic events on our business, results of operations and overall financial position remain uncertain over the long term, we expect that adverse economic conditions will continue to have an adverse impact on our revenue in future periods. For example, our installed base business, which typically contributes approximately half of our annual revenue growth, continues to experience macroeconomic headwinds.

In March 2022 we decided to close our Russia office and to establish a new European development center in Portugal, in part due to the growing uncertainty arising from the Russia-Ukraine conflict. During the three and nine months ended September 30, 2023, we incurred approximately \$0.9 million and \$2.7 million in costs related to the closure and relocation of our Russian operations, of which \$0.0 million and \$0.1 million was recorded in cost of revenue, \$0.5 million and \$1.5 million was recorded in research and development expense, \$0.2 million and \$0.5 million was recorded in general and administrative expense, and \$0.2 million and \$0.6 million was recorded in interest income and other in our condensed consolidated statements of operations and comprehensive loss. During the three and nine months ended September 30, 2022, we incurred approximately \$0.7 million and \$4.6 million in costs related to the closure and relocation of our Russian operations, of which \$0.1 million and \$0.5 million was recorded in cost of revenue, \$0.6 million and \$3.2 million was recorded in research and development expense, \$0.1 million and \$1.3 million was recorded in general and administrative expense, and \$(0.1) million and \$(0.4) million was recorded in interest income and other in our condensed consolidated statements of operations and comprehensive loss. We currently do not believe that this decision will have a material effect on our business, results of operations or financial condition.

Key GAAP Operating Results

Our revenue increased to \$230.1 million and \$671.4 million for the three and nine months ended September 30, 2023 from \$198.3 million and \$570.5 million for the three and nine months ended September 30, 2022. Revenue growth was primarily attributable to our larger clients, driven by an increase in our sales and marketing activities and our improved brand awareness. For each of the three and nine months ended September 30, 2023 and 2022, no single client accounted for more than 10% of our total revenue. As of September 30, 2023, we had over 2,500 clients across multiple industries with a wide range of seat sizes. We had a net loss of \$20.4 million and \$69.4 million in the three and nine months ended September 30, 2023, compared to a net loss of \$23.2 million and \$81.0 million in the three and nine months ended September 30, 2022.

We have continued to make significant expenditures and investments, including in sales and marketing, research and development and infrastructure. We primarily evaluate the success of our business based on revenue growth and the efficiency and effectiveness of our investments. The growth of our business and our future success depend on many factors, including our ability to continue to expand our base of larger clients, grow revenue from our existing clients, innovate and expand internationally. While these areas represent significant opportunities for us, they also pose risks and challenges that we must successfully address, including the impact of macroeconomic deterioration, the Russia-Ukraine conflict and the conflict in Israel, in order to successfully grow our business and improve our operating results.

Key Operating and Non-GAAP Financial Performance Metrics

In addition to measures of financial performance presented in our condensed consolidated financial statements, we monitor the key metrics set forth below to help us evaluate growth trends, establish budgets, measure the effectiveness of our sales and marketing efforts and assess operational efficiencies.

Annual Dollar-Based Retention Rate

We believe that our Annual Dollar-Based Retention Rate provides insight into our ability to retain and grow revenue from our clients, and is a measure of the long-term value of our client relationships. Our Annual Dollar-Based Retention Rate is calculated by dividing our Retained Net Revenue by our Retention Base Net Revenue on a monthly basis, which we then average using the rates for the trailing twelve months for the period presented. We define Retention Base Net Revenue as recurring net revenue from all clients in the comparable prior year period, and we define Retained Net Revenue as recurring net revenue from that same group of clients in the current period. We define recurring net revenue as net subscription and related usage revenue.

The following table shows our Annual Dollar-Based Retention Rate based on Net Revenue for the periods presented:

Annual Dollar-Based Retention Rate	Twelve Months Ended	
	September 30, 2023	September 30, 2022
	110%	118%

Our Dollar-Based Retention Rate decreased year-over-year primarily due to the macroeconomic headwinds we started experiencing in 2022 and continued to experience through the third quarter of 2023.

Adjusted EBITDA

We monitor adjusted EBITDA, a non-GAAP financial measure, to analyze our financial results and believe that it is useful to investors, as a supplement to U.S. GAAP measures, in evaluating our ongoing operational performance and enhancing an overall understanding of our past financial performance. We believe that adjusted EBITDA helps illustrate underlying trends in our business that could otherwise be masked by the effect of the income or expenses that we exclude from adjusted EBITDA. Furthermore, we use this measure to establish budgets and operational goals for managing our business and evaluating our performance. We also believe that adjusted EBITDA provides an additional tool for investors to use in comparing our recurring core business operating results over multiple periods with other companies in our industry.

Adjusted EBITDA should not be considered in isolation from, or as a substitute for, financial information prepared in accordance with U.S. GAAP, and our calculation of adjusted EBITDA may differ from that of other companies in our industry. We compensate for the inherent limitations associated with using adjusted EBITDA through disclosure of these limitations, presentation of our financial statements in accordance with U.S. GAAP and reconciliation of adjusted EBITDA to the most directly comparable U.S. GAAP measure, net loss. We calculate adjusted EBITDA as net loss before (1) depreciation and amortization, (2) stock-based compensation, (3) interest expense, (4) interest (income) and other, (5) exit costs related to the closure and relocation of Russian operations, (6) acquisition-related transaction and one-time integration costs, (7) contingent consideration expense, (8) refund for prior year overpayment of USF fees, (9) lease amortization for finance leases, (10) provision for income taxes, and (11) other items that do not directly affect what we consider to be our core operating performance.

The following table shows a reconciliation of net loss to adjusted EBITDA for the periods presented (in thousands):

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Net loss	\$ (20,419)	\$ (23,207)	\$ (69,406)	\$ (80,997)
Non-GAAP adjustments:				
Depreciation and amortization ⁽¹⁾	12,482	11,215	35,553	33,650
Stock-based compensation ⁽²⁾	52,611	44,503	156,721	128,682
Interest expense	1,972	1,879	5,683	5,606
Interest (income) and other	(8,233)	(982)	(18,477)	(2,107)
Exit costs related to closure and relocation of Russian operations ⁽³⁾	659	774	2,070	4,215
Acquisition-related transaction and one-time integration costs	778	1,944	3,110	5,296
Contingent consideration expense	—	—	—	260
Refund for prior year overpayment of USF fees	—	—	—	(3,511)
Lease amortization for finance leases	492	—	492	—
Provision for income taxes	942	579	2,222	3,167
Adjusted EBITDA	\$ 41,284	\$ 36,705	\$ 117,968	\$ 94,261

(1) Depreciation and amortization expenses included in our results of operations for the periods presented are as follows (in thousands):

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Cost of revenue	\$ 10,075	\$ 8,904	\$ 28,251	\$ 26,152
Research and development	831	768	2,571	2,396
Sales and marketing	36	1	38	3
General and administrative	1,540	1,542	4,693	5,099
Total depreciation and amortization	\$ 12,482	\$ 11,215	\$ 35,553	\$ 33,650

(2) See Note 7 to the condensed consolidated financial statements for stock-based compensation expense included in our results of operations for the periods presented.

(3) Exit costs related to the closure and relocation of our Russian operations were \$0.9 million and \$2.7 million during the three and nine months ended September 30, 2023. The \$0.7 million and \$2.1 million adjustments presented above were net of \$0.2 million and \$0.6 million included in "Interest (income) and other." Exit costs related to the closure and relocation of our Russian operations were \$0.7 million and \$4.6 million during the three and nine months ended September 30, 2022. The \$0.8 million and \$4.2 million adjustments presented above were net of \$0.0 million and \$0.8 million included in "Depreciation and amortization" and \$(0.1) million and \$(0.4) million included in "Interest (income) and other."

Key Components of Our Results of Operations

Revenue

Our revenue consists of subscription and related usage as well as professional services. We consider our subscription and related usage to be recurring revenue. This recurring revenue includes fixed subscription fees for the delivery and support of our VCC cloud platform, as well as related usage fees. The related usage fees are generally based on the volume of minutes for inbound and outbound client interactions. We also offer bundled plans, generally for smaller deployments, where the client is charged a single monthly fixed fee per agent seat that includes both subscription and unlimited usage in the contiguous 48 states and, in some cases, Canada. We offer monthly, annual and multiple-year contracts for our clients, generally with 30 days' notice required for reductions in the number of agent seats. Increases in the number of agent seats can be provisioned almost immediately. Our clients, therefore, are able to adjust the number of agent seats used to meet their changing contact center volume needs. Our larger clients typically choose annual contracts, which generally include an implementation and ramp period of several months.

Fixed subscription fees, including plans with bundled usage, are generally billed monthly in advance, while variable usage fees are billed in arrears. Fixed subscription fees are recognized on a straight-line basis over the applicable term, which is predominantly the monthly contractual billing period. Support activities include technical assistance for our solution and upgrades and enhancements on a when and if available basis, which are not billed

separately. Variable subscription related usage fees for non-bundled plans are billed in arrears based on client-specific per minute rate plans and are recognized as actual usage occurs. We generally require advance deposits from clients based on estimated usage. All fees, except usage deposits, are non-refundable.

In addition, we generate professional services revenue from assisting clients in implementing our solution and optimizing use. These services include application configuration, system integration and education and training services. Professional services are primarily billed on a fixed-fee basis and are typically performed by us directly. In limited cases, our clients choose to perform these services themselves or engage their own third-party service providers to perform such services. Professional services are recognized as the services are performed using the proportional performance method, with performance measured based on labor hours, provided all other criteria for revenue recognition are met.

While the implications of macroeconomic events on our business, results of operations and overall financial position remain uncertain over the long term, we expect that adverse economic conditions will continue to have an adverse impact on our revenue in future periods. For example, our installed base business, which typically contributes approximately half of our annual revenue growth, continues to experience macroeconomic headwinds.

Cost of Revenue

Our cost of revenue consists primarily of personnel costs, including stock-based compensation, fees that we pay to telecommunications providers for usage, Universal Service Fund, or USF, contributions and other regulatory costs, depreciation and related expenses of our servers and equipment, costs to build out and maintain co-location data centers, costs of public cloud-based data centers, allocated office and facility costs, amortization of acquired technology and amortization of internal-use software costs. Cost of revenue can fluctuate based on a number of factors, including the fees we pay to telecommunications providers, which vary depending on our clients' usage of our VCC cloud platform, the timing of capital expenditures and related depreciation charges and changes in headcount. We expect to continue investing in professional services, public cloud, cloud operations, client support and network infrastructure to maintain high quality and availability of services, which we believe will result in absolute dollar increases in cost of revenue but percentage of revenue declines in the long-term through economies of scale.

Operating Expenses

We classify our operating expenses as research and development, sales and marketing, and general and administrative expenses.

Research and Development. Our research and development expenses consist primarily of salary and related expenses, including stock-based compensation, for personnel related to the development of improvements and expanded features for our services, as well as quality assurance, testing, product management and allocated overhead. We expense research and development expenses as they are incurred except for internal use software development costs that qualify for capitalization. We believe that continued investment in our solution is important for our future growth, and we expect our research and development expenses to increase in absolute dollars and fluctuate as a percentage of revenue in the near and longer term.

Sales and Marketing. Sales and marketing expenses consist primarily of salaries and related expenses, including stock-based compensation, for personnel in sales and marketing, sales commissions, as well as advertising, marketing, corporate communications, travel costs and allocated overhead. We believe it is important to continue investing in sales and marketing to continue to generate revenue growth, and we expect sales and marketing expenses to increase in absolute dollars and fluctuate as a percentage of revenue in the near and longer term as we continue to support our growth initiatives.

General and Administrative. General and administrative expenses consist primarily of salary and related expenses, including stock-based compensation, for management, finance and accounting, legal, information systems and human resources personnel, professional fees, compliance costs, other corporate expenses and allocated overhead. We expect that general and administrative expenses will fluctuate in absolute dollars and as a percentage of revenue in the near term, but to increase in absolute dollars and decline as a percentage of revenue in the longer term.

Results of Operations for the Three and Nine Months Ended September 30, 2023 and 2022

Based on the condensed consolidated statements of operations and comprehensive loss set forth in this Quarterly Report on Form 10-Q, the following table sets forth our operating results as a percentage of revenue for

the periods indicated:

	Three Months Ended		Nine Months Ended	
	September 30, 2023	September 30, 2022	September 30, 2023	September 30, 2022
Revenue	100 %	100 %	100 %	100 %
Cost of revenue	48 %	47 %	48 %	48 %
Gross profit	52 %	53 %	52 %	52 %
Operating expenses:				
Research and development	18 %	17 %	18 %	18 %
Sales and marketing	32 %	34 %	33 %	34 %
General and administrative	13 %	13 %	13 %	13 %
Total operating expenses	63 %	64 %	64 %	65 %
Loss from operations	(11)%	(11)%	(12)%	(13)%
Other income (expense), net:				
Interest expense	(1)%	(1)%	(1)%	(1)%
Interest income and other	4 %	— %	3 %	— %
Total other income (expense), net	3 %	(1)%	2 %	(1)%
Loss before income taxes	(8)%	(12)%	(10)%	(14)%
Provision for income taxes	1 %	— %	— %	— %
Net loss	(9)%	(12)%	(10)%	(14)%

Revenue

	Three Months Ended				Nine Months Ended			
	September 30, 2023	September 30, 2022	\$ Change	% Change	September 30, 2023	September 30, 2022	\$ Change	% Change
	(in thousands, except percentages)							
Revenue	\$ 230,105	\$ 198,342	\$ 31,763	16 %	\$ 671,426	\$ 570,501	\$ 100,925	18 %

The increase in revenue for the three and nine months ended September 30, 2023 compared to the same periods of 2022 was primarily attributable to our larger clients, driven by an increase in our sales and marketing activities and our improved brand awareness.

Cost of Revenue

	Three Months Ended				Nine Months Ended			
	September 30, 2023	September 30, 2022	\$ Change	% Change	September 30, 2023	September 30, 2022	\$ Change	% Change
	(in thousands, except percentages)							
Cost of revenue	\$ 111,080	\$ 94,111	\$ 16,969	18 %	\$ 320,197	\$ 271,207	\$ 48,990	18 %
% of Revenue	48 %	47 %			48%	48%		

The increase in cost of revenue for the three months ended September 30, 2023 compared to the same period of 2022 was primarily due to a \$5.4 million increase in personnel costs driven mainly by increased headcount, higher salaries and increased stock-based compensation costs, a \$5.1 million increase in third-party hosted software costs driven by increased client activities, a \$4.6 million increase in depreciation, data center and public cloud costs to support our growing capacity needs, \$0.8 million increase in office, facilities and related costs, a \$0.7 million increase in amortization of intangibles mainly due to our acquisition of intangibles from Aceyus, and a \$0.5 million increase in usage and carrier costs due to increased volume offset in part by a rate reduction, partially offset by \$0.3 million decrease in staff augmentation costs related to implementation of our solution.

The increase in cost of revenue for the nine months ended September 30, 2023 compared to the same period of 2022 was primarily due to a \$15.3 million increase in third-party hosted software costs driven by increased client activities, a \$13.4 million increase in depreciation, data center and public cloud costs to support our growing capacity needs, a \$13.3 million increase in personnel costs driven mainly by increased headcount, higher salaries

and increased stock-based compensation costs, a \$6.9 million increase in USF contributions and other federal telecommunication service fees due to increased client usage and a change in methodology in the prior year, which resulted in a \$3.5 million refund for 2020 that was received in the nine months ended September 30, 2022, offset in part by a decrease in the USF contribution rate, a \$1.2 million increase in office, facilities and related costs, and a \$0.5 million increase in amortization of intangibles mainly due to our acquisition of intangibles from Aceyus, partially offset by a \$1.4 million decrease in staff augmentation costs related to implementation of our solutions, and a \$1.0 million decrease in usage and carrier costs due to a rate reduction offset in part by increased volume.

Gross Profit

	Three Months Ended				Nine Months Ended			
	September 30, 2023	September 30, 2022	\$ Change	% Change	September 30, 2023	September 30, 2022	\$ Change	% Change
	(in thousands, except percentages)							
Gross profit	\$ 119,025	\$ 104,231	\$ 14,794	14 %	\$351,229	\$299,294	\$51,935	17%
% of Revenue	52 %	53 %			52%	52%		

The increase in gross profit for the three and nine months ended September 30, 2023 compared to the same periods of 2022 was primarily due to increases in subscription and related revenues. The decrease in gross margin for the three months ended September 30, 2023 compared to the same period of 2022 was primarily due to our revenue growing at a slower rate than our increase in cost of revenue as described above. We expect gross margin to increase in the long term despite continued investments in professional services, public cloud, cloud operations, client support and network infrastructure, as we expect revenue growth in the long term to more than offset these increases.

Operating Expenses

Research and Development

	Three Months Ended				Nine Months Ended			
	September 30, 2023	September 30, 2022	\$ Change	% Change	September 30, 2023	September 30, 2022	\$ Change	% Change
	(in thousands, except percentages)							
Research and development	\$ 40,391	\$ 34,113	\$ 6,278	18 %	\$117,709	\$104,929	\$12,780	12%
% of Revenue	18 %	17 %			18%	18%		

The increase in research and development expenses for the three and nine months ended September 30, 2023 compared to the same periods of 2022 was primarily due to a \$7.6 million and \$16.1 million increase in personnel-related costs driven mainly by an increase in stock-based compensation costs, increased headcount and higher salaries, and a \$0.5 million and \$0.8 million increase in office, facilities and related costs, offset in part by a \$1.7 million and \$4.9 million increase in research and development costs that qualified for capitalization and a \$1.0 million and \$0.5 million decrease in one-time integration costs.

Sales and Marketing

	Three Months Ended				Nine Months Ended			
	September 30, 2023	September 30, 2022	\$ Change	% Change	September 30, 2023	September 30, 2022	\$ Change	% Change
	(in thousands, except percentages)							
Sales and marketing	\$ 73,366	\$ 67,353	\$ 6,013	9 %	\$223,757	\$196,062	\$27,695	14%
% of Revenue	32 %	34 %			33%	34%		

The increase in sales and marketing expenses for the three and nine months ended September 30, 2023 compared to the same periods of 2022 was primarily due to a \$3.3 million and \$10.4 million increase in sales commission expenses driven by the growth in sales and bookings of our solution, a \$2.0 million and \$12.1 million increase in personnel costs driven by increased stock-based compensation costs, increased headcount and higher salaries, and a \$0.8 million and \$1.6 million increase in travel costs as a result of an increase in business travel. The increases in sales and marketing expenses were primarily due to the execution of our growth strategy to acquire new

clients, increase the number of agent seats within our existing client base, and increased advertising and other marketing expenses to increase our brand awareness.

General and Administrative

	Three Months Ended				Nine Months Ended			
	September 30, 2023	September 30, 2022	\$ Change	% Change	September 30, 2023	September 30, 2022	\$ Change	% Change
(in thousands, except percentages)								
General and administrative	\$ 31,006	\$ 24,496	\$ 6,510	27 %	\$89,741	\$72,634	\$17,107	24%
% of Revenue	13 %	13 %			13%	13%		

The increase in general and administrative expenses for the three and nine months ended September 30, 2023 compared to the same periods of 2022 was primarily due to a \$5.5 million and \$15.9 million increase in personnel costs driven by increased stock-based compensation costs, increased headcount and higher salaries, and a \$1.2 million and \$1.5 million increase in legal and other professional service costs primarily as a result of the legal expenses incurred in connection with the Aceyus acquisition.

Other Income (Expense), Net

	Three Months Ended				Nine Months Ended			
	September 30, 2023	September 30, 2022	\$ Change	% Change	September 30, 2023	September 30, 2022	\$ Change	% Change
(in thousands, except percentages)								
Interest expense	\$ (1,972)	\$ (1,879)	\$ (93)	5 %	\$ (5,683)	\$ (5,606)	\$ (77)	1 %
Interest income and other	8,233	982	7,251	738 %	18,477	2,107	16,370	777 %
Total other income (expense), net	\$ 6,261	\$ (897)	\$ 7,158	(798)%	\$ 12,794	\$ (3,499)	\$ 16,293	(466)%
% of Revenue	3 %	(1)%			2 %	(1)%		

Interest expense remained consistent for the three and nine months ended September 30, 2023 compared to the same periods of 2022 since it primarily related to our 2025 convertible senior notes for which the aggregate outstanding principal amount remained the same during these periods. See Note 6 to the consolidated financial statements for further details.

The increase in interest income and other for the three and nine months ended September 30, 2023 compared to the same periods of 2022 was primarily due to higher interest income on our marketable investments, offset in part by an increase in foreign currency transaction losses during the nine months ended September 30, 2023.

Liquidity and Capital Resources

To date, we have financed our operations primarily through sales of our solution, net proceeds from our equity and debt financings, including the issuance of our 2025 convertible senior notes in May and June 2020 and of our 2023 convertible senior notes in May 2018, and lease facilities. As of September 30, 2023, we had \$718.7 million in working capital, which included \$127.8 million in cash and cash equivalents and \$572.5 million in marketable investments. The Company's intent is that all marketable investments are available for use in its current operations, including marketable investments with maturity dates greater than one year from September 30, 2023. The 2023 convertible senior notes matured on May 1, 2023 and were settled in a combination of cash and shares of our common stock. Upon maturity, the outstanding capped calls associated with the repurchase and early settlements of \$194.7 million 2023 convertible senior notes were settled, which resulted in us receiving 370,877 shares and \$74.5 million. We believe our existing cash and cash equivalents will be sufficient to meet our working capital and capital expenditure needs for at least the next 12 months.

We plan to continue to finance our operations in the future primarily through sales of our solution, net proceeds from equity and debt financings, and lease facilities. Our future capital requirements will depend on many factors including our growth rate, continuing market acceptance of our solution, the strength of the global economy,

client retention, growth within our installed base, our ability to gain new clients, the timing and extent of spending to support research and development efforts, the outcome of any pending or future litigation or other claims by third parties or governmental entities, the expansion of sales and marketing activities and personnel, the introduction of new and enhanced offerings, expenses incurred in closing our Russia operations and expanding our operations in Portugal and any operational disruptions due to this transition, and the effect of the length and severity of the current economic downturn, the Russia-Ukraine conflict, and the conflict in Israel on these or other factors. We may also acquire or invest in complementary businesses, technologies and intellectual property rights, such as our recent acquisition of Aceyus in August 2023, which may increase our use of cash and future capital requirements, both to pay acquisition costs and to support our combined operations. We may raise additional capital through equity or debt financings at any time to fund these or other requirements. However, we may not be able to raise additional capital through equity or debt financings when needed on terms acceptable to us or at all, depending on our financial performance, economic and market conditions, the trading price of our common stock, and other factors, including the length and severity of the current economic downturn and fluctuations in the financial markets, including due to the Russia-Ukraine conflict and the conflict in Israel. If we are unable to raise additional capital as needed, our business, operating results and financial condition could be harmed. In addition, if our operating performance during the next twelve months is below our expectations, our liquidity and ability to operate our business also could be harmed.

If we raise additional funds by issuing equity or equity-linked securities, the ownership of our existing stockholders would be diluted. If we raise additional funds through the incurrence of additional indebtedness, we will be subject to increased debt service obligations and could also be subject to restrictive covenants and other operating restrictions that could negatively impact our ability to operate our business.

Cash Flows

The following table summarizes our cash flows for the periods presented (in thousands):

	Nine Months Ended	
	September 30, 2023	September 30, 2022
Net cash provided by operating activities	\$ 92,294	\$ 56,125
Net cash (used in) provided by investing activities	(234,974)	20,903
Net cash provided by (used in) financing activities	91,047	(38,461)
Net (decrease) increase in cash, cash equivalents and restricted cash	\$ (51,633)	\$ 38,567

Cash Flows from Operating Activities

Cash provided by operating activities is primarily influenced by our personnel-related expenditures, data center and telecommunications carrier costs, office and facility related costs, USF contributions and other regulatory costs and the amount and timing of client payments. If we continue to improve our financial results, we expect net cash provided by operating activities to increase. Our largest source of operating cash inflows is cash collections from our clients for subscription and related usage services. Payments from clients for these services are typically received monthly.

Net cash provided by operating activities was \$92.3 million during the nine months ended September 30, 2023. Net cash provided by operating activities resulted from our net loss of \$69.4 million, adjustments to reconcile net loss to net cash provided by operating activities of \$238.6 million, primarily consisting of \$156.7 million of stock-based compensation, \$35.6 million of depreciation and amortization, \$40.1 million of amortization of commission costs, \$9.2 million of amortization of operating lease right-of-use assets and \$2.8 million of amortization of issuance costs on our convertible senior notes, partially offset by use of cash for operating assets and liabilities of \$(76.9) million primarily due to the timing of cash payments to vendors and cash receipts from customers.

Net cash provided by operating activities was \$56.1 million during the nine months ended September 30, 2022. Net cash provided by operating activities resulted from our net loss of \$81.0 million, adjustments to reconcile net loss to net cash provided by operating activities of \$200.6 million, primarily consisting of \$128.7 million of stock-based compensation, \$33.7 million of depreciation and amortization, \$29.2 million of amortization of commission costs, \$2.8 million of amortization of issuance costs on our convertible senior notes, and \$(5.9) million adjustment for the Inference contingent consideration in excess of its acquisition-date fair value, offset by use of

cash for operating assets and liabilities of \$(63.5) million primarily due to the timing of cash payments to vendors and cash receipts from customers.

Cash Flows from Investing Activities

Net cash used in investing activities of \$(235.0) million in the nine months ended September 30, 2023 was comprised of \$544.7 million related to purchases of marketable investments, \$80.6 million, net of cash acquired in connection with the acquisition of Aceyus, \$19.9 million in capital expenditures and \$5.8 million in capitalized software development costs, offset in part by \$416.1 million related to cash proceeds from sales and maturities of marketable investments.

Net cash provided by investing activities of \$20.9 million in the nine months ended September 30, 2022 was comprised of \$321.9 million related to cash proceeds from sales and maturities of marketable investments, offset in part by \$250.3 million related to purchases of marketable investments, \$46.0 million in capital expenditures, \$2.0 million in connection with an equity investment in a privately-held company and \$2.4 million in capitalized software development costs.

Cash Flows from Financing Activities

Net cash provided by financing activities of \$91.0 million in the nine months ended September 30, 2023 was related to \$74.5 million of cash received from the settlement at maturity of the outstanding capped calls associated with the repurchase and early settlements of the 2023 convertible senior notes, \$9.4 million from the sale of common stock under our employee stock purchase plan, and cash proceeds of \$8.3 million from the exercise of stock options, offset in part by \$0.5 million of holdback payment related to an acquisition, \$0.5 million of payments related to finance leases and \$0.2 million of cash paid in connection with 2023 convertible senior note settlements.

Net cash used in financing activities of \$(38.5) million in the nine months ended September 30, 2022 related to \$34.1 million of cash paid in connection with 2023 convertible senior note settlements and \$24.0 million of cash paid in connection with the contingent consideration payment related to the Inference acquisition, of which \$18.1 million represented the acquisition-date fair value and was disclosed as a financing activity and \$5.9 million represented the amount of payment in excess of the acquisition-date fair value and was disclosed as an adjustment to operating activity, partially offset by \$8.3 million from the sale of common stock under our employee stock purchase plan, and cash proceeds of \$5.4 million from exercise of stock options.

Critical Accounting Policies and Estimates

Our condensed consolidated financial statements are prepared in accordance with U.S. GAAP. The preparation of these financial statements requires us to make estimates and assumptions that affect the reported amounts of assets, liabilities, revenue, expenses and related disclosures. On an ongoing basis, we evaluate our estimates and assumptions. Our actual results may differ from these estimates under different assumptions or conditions.

There have been no material changes to our critical accounting policies and estimates from those disclosed in our Annual Report on Form 10-K for the fiscal year ended December 31, 2022 filed with the SEC on February 24, 2023.

Recent Accounting Pronouncements

Refer to Note 1 of the notes to condensed consolidated financial statements included in this report.

Contractual and Other Obligations

Our material cash requirements include the following contractual and other obligations.

Convertible Senior Notes

In May and June 2020, we issued \$747.5 million aggregate principal amount of our 2025 convertible senior notes in a private offering. The 2025 convertible senior notes mature on June 1, 2025 and are our senior unsecured obligations. The 2025 convertible senior notes bear interest at a fixed rate of 0.50% per annum, payable semiannually in arrears on June 1 and December 1 of each year, beginning December 1, 2020. The total net proceeds from the offering, after deducting initial purchasers' discounts and commissions and estimated debt issuance costs,

were approximately \$728.8 million. As of September 30, 2023, the aggregate principal amount outstanding of our 2025 convertible senior notes was \$747.5 million.

In May 2018, we issued \$258.8 million aggregate principal amount of our 2023 convertible senior notes in a private offering. As of March 31, 2023, after giving effect to the 2023 Note Repurchase Transactions and other settlements upon conversion requests, approximately \$0.2 million aggregate principal amount of 2023 convertible senior notes remained outstanding. The 2023 convertible senior notes matured on May 1, 2023 and the remaining principle amounts were settled in a combination of cash and shares of our common stock.

For additional information regarding the convertible senior notes, see Note 6 to the consolidated financial statements included in this report.

Leases

We have leases for offices, data centers and computer and networking equipment that expire at various dates through 2031. Our leases have remaining terms of one to eight years. Some of the leases include an option to extend the leases for up to one to five years, and some of the leases include the option to terminate the leases upon 30-days' notice. We had outstanding operating lease obligations of \$55.1 million as of September 30, 2023, with \$3.7 million payable in the remainder of 2023, \$21.2 million payable in 2024 and 2025, \$12.9 million payable in 2026 and 2027, and \$17.3 million after 2027. We also had outstanding finance lease obligations of \$5.0 million as of September 30, 2023, with \$0.4 million payable in the remainder of 2023, \$3.7 million payable in 2024 and 2025, and \$0.9 million payable in 2026. See Note 12 to the consolidated financial statements included in this report for further details.

Cloud Services and Software and Maintenance

As of September 30, 2023, we had outstanding cloud services and software and maintenance agreement commitments totaling \$72.0 million, of which \$10.9 million is expected to be paid in the remainder of 2023, \$40.7 million is expected to be paid in 2024, \$19.9 million is expected to be paid in 2025, and the remaining \$0.5 million is expected to be paid in 2026.

Hosting and Telecommunication Usage Services

We have agreements with third parties to provide co-location hosting and telecommunication services. The agreements require payments per month for a fixed period of time in exchange for certain guarantees of network and telecommunication availability. As of September 30, 2023, we had outstanding co-location hosting and telecommunication obligations of \$17.0 million, with \$2.1 million payable in the remainder of 2023, \$11.3 million payable in 2024 and 2025, \$3.2 million payable in 2026 and 2027, and \$0.4 million payable in 2028.

Indemnification Agreements

In the ordinary course of business, we enter into agreements of varying scope and terms pursuant to which we agree to indemnify clients, vendors, lessors, business partners and other parties with respect to certain matters, including, but not limited to, losses arising out of breach of such agreements, services to be provided by us or from intellectual property infringement claims made by third parties. In addition, we have entered into indemnification agreements with our directors, officers and certain employees that will require us, among other things, to indemnify them against certain liabilities that may arise by reason of their status or service as directors, officers or employees. There are no claims that we are aware of that could have a material effect on our consolidated balance sheet, consolidated statements of operations and comprehensive loss, or consolidated statements of cash flows.

Contingencies — Legal and Regulatory

We are subject to certain legal and regulatory proceedings, and from time to time may be involved in a variety of claims, lawsuits, investigations, and proceedings relating to contractual disputes, intellectual property rights, employment matters, regulatory compliance matters, and other litigation matters relating to various claims that arise in the normal course of business. We determine whether an estimated loss from a contingency should be accrued by assessing whether a loss is deemed probable and can be reasonably estimated. We assess our potential liability by analyzing specific litigation and regulatory matters using reasonably available information. We develop our views on estimated losses in consultation with inside and outside counsel, which involves a subjective analysis of potential results and outcomes, assuming various combinations of appropriate litigation and settlement strategies. Legal fees are expensed in the period in which they are incurred. See Note 10 to the consolidated financial statements for more details.

ITEM 3. Quantitative and Qualitative Disclosures about Market Risk

We are exposed to market risk in the ordinary course of our business. Market risk represents the risk of loss that may impact our financial position due to adverse changes in financial market prices and rates. Our market risk exposure is primarily a result of fluctuations in interest rates and foreign currency exchange rates. We do not hold or issue financial instruments for trading purposes. For a discussion of market risk, see “Quantitative and Qualitative Disclosure about Market Risk” in Item 7A of our Annual Report on Form 10-K for the fiscal year ended December 31, 2022. Our exposure to market risk has not changed materially since December 31, 2022.

Interest Rate Sensitivity

We had cash and cash equivalents, and marketable securities totaling \$700.3 million as of September 30, 2023. Cash equivalents and marketable securities were invested primarily in U.S. agency and government sponsored securities, U.S. treasury securities, municipal bonds, commercial paper, corporate bonds, certificates of deposit and money market funds. Our investment policy is focused on the preservation of capital and supporting our liquidity needs. Under this policy, we invest in highly rated securities, while limiting the amount of credit exposure to any one issuer other than the U.S. government. We do not invest in financial instruments for trading or speculative purposes, nor do we use leveraged financial instruments. We utilize external investment managers who adhere to the guidelines of our investment policy. A hypothetical 100 basis point change in interest rates would not have a material impact on the value of our cash and cash equivalents or marketable investments.

As of September 30, 2023, aggregate principal amount outstanding of our 2025 convertible senior notes was \$747.5 million. The fair value of the convertible senior notes are subject to interest rate risk, market risk and other factors due to their conversion features. The fair value of the convertible senior notes will generally increase as our common stock price increases and will generally decrease as our common stock price declines. The interest and market value changes affect the fair value of the convertible senior notes but do not impact our financial position, cash flows or results of operations due to the fixed nature of the debt obligations. Additionally, we carry the convertible senior notes at face value less unamortized discount on our condensed consolidated balance sheets, and we present the fair value for required disclosure purposes only.

Our 2025 convertible senior notes bear fixed interest rates and, therefore, are not subject to interest rate risk. We have not utilized derivative financial instruments, derivative commodity instruments or other market risk sensitive instruments, positions or transactions in any material fashion, except for the privately negotiated capped call transactions entered into in May and June 2020 related to the issuance of our 2025 convertible senior notes.

Foreign Currency Risk

The functional currency of our foreign subsidiaries is the U.S. dollar. Our sales are primarily denominated in U.S. dollars and, therefore, our revenue is not directly subject to foreign currency risk. However, we are indirectly exposed to foreign currency risk. A stronger U.S. dollar makes our solution more expensive outside the United States and therefore can reduce demand. A weaker U.S. dollar could have the opposite effects. Such economic exposure to currency fluctuations is difficult to measure or predict because our sales are influenced by many factors in addition to the impact of currency fluctuations. Our operating expenses are generally denominated in the currencies of the countries in which our operations are located, except for Russia where compensation of our employees was primarily denominated in the U.S. dollar. In March 2022, we made a decision to close our Russia office in June 2022 and to establish a new European development center in Portugal.

Our consolidated results of operations and cash flows are, therefore, subject to fluctuations due to changes in foreign currency exchange rates and may be adversely affected in the future due to changes in foreign exchange rates. To date, we have not entered into any hedging arrangements with respect to foreign currency risk or other derivative financial instruments. During the nine months ended September 30, 2023, the effect of a hypothetical 10% change in foreign currency exchange rates applicable to our business would have a maximum impact of \$5.9 million on our operating expenses.

ITEM 4. Controls and Procedures

Evaluation of Disclosure Controls and Procedures

Under the supervision and with the participation of our management, including our Chief Executive Officer and Chief Financial Officer, we conducted an evaluation of the effectiveness of our disclosure controls and procedures, as defined in Rules 13a-15(e) and 15d-15(e) under the Exchange Act, as of September 30, 2023.

Based on management's evaluation, our Chief Executive Officer and Chief Financial Officer concluded that, as of September 30, 2023, our disclosure controls and procedures were designed, and were effective, to provide assurance at a reasonable level that the information we are required to disclose in reports that we file or submit under the Exchange Act is recorded, processed, summarized and reported within the time periods specified in the SEC rules and forms, and that such information is accumulated and communicated to our management as appropriate to allow timely decisions regarding required disclosures.

In designing and evaluating our disclosure controls and procedures, management recognizes that any disclosure controls and procedures, no matter how well designed and operated, can provide only reasonable assurance of achieving the desired control objectives. In addition, the design of disclosure controls and procedures must reflect the fact that there are resource constraints and that management is required to apply its judgment in evaluating the benefits of possible controls and procedures relative to their costs.

Changes in Internal Control over Financial Reporting

During the three months ended September 30, 2023, there was no change in our internal control over financial reporting that has materially affected, or is reasonably likely to materially affect, our internal control over financial reporting.

PART II. OTHER INFORMATION

ITEM 1. Legal Proceedings

Information with respect to this Item may be found under the heading “Legal Matters” in Note 10 to the condensed consolidated financial statements in this Quarterly Report on Form 10-Q, which information is incorporated herein by reference.

ITEM 1A. Risk Factors

Except for the below risk factors, which update those previously disclosed in our Annual Report on Form 10-K as filed with the SEC on February 24, 2023, there have been no material changes from the Risk Factors previously disclosed in Part 1, Item 1A, of our Annual Report on Form 10-K for the fiscal year ended December 31, 2022. In addition to the other information set forth in this report, including the below update to Risk Factors, you should carefully consider the Risk Factors discussed in our Annual Report on Form 10-K as they could materially affect our business, financial condition and future results of operation.

Further development of our AI solutions may not be successful and may result in reputational harm and our future operating results could be materially harmed.

We plan to continue to further develop and enhance our AI-powered features. While we aim for our AI-powered features to make agents more efficient and improve customer experience, our AI features may not achieve sufficient levels of accuracy or may not otherwise meet the needs of our clients. In addition, we may not be able to incorporate sufficient customer training data and such data may contain biased or otherwise inaccurate information. Furthermore, our competitors or other organizations may incorporate AI features into their products more quickly or more successfully and their AI features may achieve higher market acceptance than ours, which may result in us failing to recoup our investments in developing AI-powered features and result in lost business. Should any of these factors or others occur, our ability to compete, our reputation and operating results may be materially and adversely affected.

The AI technology and features incorporated into our solution include new and evolving technologies that may present both legal and business risks.

We have incorporated a number of AI-powered features into our solution, and are making investments in expanding our AI capabilities. AI technologies are complex and rapidly evolving, and we face significant competition from other companies as well as an evolving legal and regulatory landscape. The incorporation of AI-powered features into our solution may subject us to new or enhanced governmental or regulatory scrutiny, litigation, confidentiality or security risks, ethical concerns, or other complications that could harm our business, reputation, financial condition or results of operations. Intellectual property ownership and license rights, including copyright, surrounding AI technologies has not been fully addressed by federal or state laws or by U.S. courts, and the manner in which we configure and use AI technologies may expose us to claims of copyright infringement or other intellectual property misappropriation. It is possible that new laws and regulations will be adopted in the United States and in other countries, or that existing laws and regulations will be interpreted in ways that would affect the operation of our solution and the way in which we use AI. Further, the cost to comply with such laws or regulations could be significant and would increase our operating expenses, which could harm our business, reputation, financial condition and results of operations.

Uncertainty around new and emerging AI technologies, such as generative AI, may require additional investment, development of new approaches and processes, which will be costly and increase our expenses. Large language models, or LLMs, can generate written content which contains bias, factual errors, misrepresentations, offensive language, or inappropriate statements. While we seek to use LLMs in a way that is designed to minimize these risks, there are still risks of such events occurring. Our failure to address these risks could harm our business, reputation, financial condition and results of operations. In addition, the use of AI involves significant technical complexity and requires specialized expertise, and competition for specialized personnel in the AI industry is intense. Any disruption or failure in our AI systems or infrastructure could result in delays or errors in our operations, which could harm our business, reputation, financial condition and results of operations.

The use of AI by our workforce may present risks to our business.

Our workforce is exposed to and uses AI technologies for certain tasks related to our business. We have guidelines specifically directed at the use of AI tools in the workplace, including our code of conduct, confidentiality obligations, IT internal use policies and other corporate policies. Nevertheless, our workforce may use these authorized or unauthorized tools, which poses potential risks relating to the protection of data, including cybersecurity risk, exposure of our proprietary confidential information to unauthorized recipients and the misuse of our or third-party intellectual property. Use of AI technology by our workforce even when used consistent with our guidelines, may result in allegations or claims against us related to violation of third-party intellectual property rights, unauthorized access to or use of proprietary information and failure to comply with open source software requirements. AI technology may also produce inaccurate responses that could lead to errors in our decision-making, solution development or other business activities, which could have a negative impact on our business, operating results and financial condition. Our ability to mitigate these risks will depend on our continued effective training, monitoring and enforcement of appropriate policies, guidelines and procedures governing the use of AI technology, and compliance by our workforce.

ITEM 2. Unregistered Sales of Equity Securities and Use of Proceeds

Not applicable.

ITEM 3. Defaults Upon Senior Securities

None.

ITEM 4. Mine Safety Disclosures

Not applicable.

ITEM 5. Other Information**Rule 10b5-1 Plans**

During the fiscal quarter ended September 30, 2023, the following Company's directors and officers adopted, modified, or terminated a Rule 10b5-1 trading arrangement or a non-Rule 10b5-1 trading arrangement:

<u>Name</u>	<u>Title</u>	<u>Adoption Date</u>	<u>Expiration Date</u>	<u>Aggregate # of securities to be sold</u>	<u>Aggregate # of securities to be purchased</u>	<u>Type of Arrangement</u>
Leena Mansharamani	Chief Accounting Officer	Sept. 13, 2023	Dec. 31, 2024	Not determinable (1)	0	Rule 10b5-1 trading arrangement (2)

(1) Rule 10b5-1 trading arrangement provides for sales of securities in order to satisfy tax obligations upon vesting of restricted stock units held by Ms. Mansharamani.

(2) The Rule 10b5-1 trading arrangement is intended to satisfy the affirmative defense conditions of Rule 10b5-1(c).

ITEM 6. Exhibits

Exhibit Number	Description
3.1 ⁽¹⁾	Amended and Restated Bylaws of Five9, Inc.
31.1 *	Certification of Chief Executive Officer of Five9, Inc. Pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.
31.2 *	Certification of Chief Financial Officer of Five9, Inc. Pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.
32.1 **	Certification of Chief Executive Officer and Chief Financial Officer of Five9, Inc. Pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.
101.INS*	XBRL Instance Document - the instance document does not appear in the Interactive Data File because its XBRL tags are embedded within the Inline XBRL document.
101.SCH*	XBRL Taxonomy Schema Linkbase Document
101.CAL*	XBRL Taxonomy Calculation Linkbase Document
101.DEF*	XBRL Taxonomy Definition Linkbase Document
101.LAB*	XBRL Taxonomy Labels Linkbase Document
101.PRE*	XBRL Taxonomy Presentation Linkbase Document
104	Cover Page Interactive Data File. Formatted as inline XBRL and contained in Exhibit 101.

* Filed herewith.

** Furnished herewith.

⁽¹⁾ Filed here to included updated contact information in the Amended and Restated Bylaws of Five9, Inc. filed as Exhibit 3.1. to the Company's Form 10-Q filed with the SEC on August 7, 2023.

AMENDED AND RESTATED BYLAWS

OF

FIVE9, INC.

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ARTICLE I

STOCKHOLDERS

1.1 Place of Meetings. All meetings of stockholders shall be held at such place, if any, as may be designated from time to time by the Board of Directors (the "Board") of Five9, Inc. (the "Corporation"), the Chairman of the Board or the Chief Executive Officer or, if not so designated, at the principal office of the Corporation. The Board may, in its sole discretion, determine that a meeting shall not be held at any place, but may instead be held solely by means of remote communication in accordance with Section 211(a) of the General Corporation Law of the State of Delaware (the "DGCL").

1.2 Annual Meeting. The annual meeting of stockholders for the election of directors to succeed those whose terms expire and for the transaction of such other business as may properly be brought before the meeting shall be held on a date and at a time designated by the Board, the Chairman of the Board or the Chief Executive Officer (which date shall not be a legal holiday in the place, if any, where the meeting is to be held). The Board may postpone, recess, reschedule or cancel any previously scheduled annual meeting of stockholders.

1.3 Special Meetings. Special meetings of stockholders for any purpose or purposes may be called at any time by the Board, the Chairman of the Board or the Chief Executive Officer, and may not be called by any other person or persons. The Board may postpone, recess, reschedule or cancel any previously scheduled special meeting of stockholders. Business transacted at any special meeting of stockholders shall be limited to matters relating to the purpose or purposes stated in the notice of meeting. For the avoidance of doubt, stockholders shall not be permitted to propose business to be brought before a special meeting of stockholders.

1.4 Notice of Meetings. Except as otherwise provided by law, the Certificate of Incorporation or these Bylaws, notice of each meeting of stockholders, whether annual or special, shall be given in a form permitted by Section 5.9 or by the DGCL not less than ten (10) nor more than sixty (60) days before the date of the meeting to each stockholder entitled to vote at such meeting as of the record date for determining the stockholders entitled to notice of the meeting. The notices of all meetings shall state the place, if any, date and time of the meeting, the means of remote communications, if any, by which stockholders and proxyholders may be deemed to be present in person and vote at such meeting, and the record date for determining the stockholders entitled to vote at the meeting (if such date is different from the record date for stockholders entitled to notice of the meeting). The notice of a special meeting shall state, in addition, the purpose or purposes for which the meeting is called.

1.5 Voting List. The Corporation shall prepare, at least ten (10) days before every meeting of stockholders, a complete list of the stockholders entitled to vote at the meeting (provided, however, if the record date for determining the stockholders entitled to vote is less than ten (10) days before the date of the meeting, the list shall reflect the stockholders entitled to vote as of the tenth day before the meeting date), arranged in alphabetical order, and showing the address of each stockholder and the number of shares registered in the name of each stockholder. Such list shall be open to the examination of any stockholder, for any purpose germane to the meeting, for a period of at least ten (10) days prior to the meeting: (a) on a reasonably accessible

electronic network, provided that the information required to gain access to such list is provided with the notice of the meeting, or (b) during ordinary business hours, at the principal place of business of the Corporation. If the Corporation determines to make the list available on an electronic network, the Corporation may take reasonable steps to ensure that such information is available only to the stockholders. Except as otherwise provided by law, the list shall presumptively determine the identity of the stockholders entitled to vote at the meeting and the number of shares held by each of them.

1.6 Quorum. Except as otherwise provided by law, the Certificate of Incorporation or these Bylaws, the holders of a majority in voting power of the shares of the capital stock of the Corporation issued and outstanding and entitled to vote at the meeting, present in person, present by means of remote communication in a manner, if any, authorized by the Board in its sole discretion, or represented by proxy, shall constitute a quorum for the transaction of business; provided, however, that where a separate vote by a class or classes or series of capital stock is required by law or the Certificate of Incorporation, the holders of a majority in voting power of the shares of such class or classes or series of the capital stock of the Corporation issued and outstanding and entitled to vote on such matter, present in person, present by means of remote communication in a manner, if any, authorized by the Board in its sole discretion, or represented by proxy, shall constitute a quorum entitled to take action with respect to the vote on such matter. A quorum, once established at a meeting, shall not be broken by the withdrawal of enough votes to leave less than a quorum.

1.7 Adjournments. Any meeting of stockholders, annual or special, may be adjourned from time to time to any other time and to any other place at which a meeting of stockholders may be held under these Bylaws by the chairman of the meeting or, if directed to be voted on by the chairman of the meeting, by the stockholders present or represented at the meeting and entitled to vote thereon, although less than a quorum. When a meeting is adjourned to another place, date, or time, notice need not be given of the adjourned meeting if the place, if any, date and time thereof, and the means of remote communications, if any, by which stockholders and proxy holders may be deemed to be present in person and vote at such adjourned meeting, are provided in a manner permitted by Section 222 of the DGCL (or any successor provision). If the adjournment is for more than thirty (30) days, a notice of the adjourned meeting shall be given to each stockholder of record entitled to vote at the meeting. If after the adjournment a new record date for determination of stockholders entitled to vote is fixed for the adjourned meeting, the Board shall fix as the record date for determining stockholders entitled to notice of such adjourned meeting the same or an earlier date as that fixed for determination of stockholders entitled to vote at the adjourned meeting, and shall give notice of the adjourned meeting to each stockholder of record as of the record date so fixed for notice of such adjourned meeting. At the adjourned meeting, the Corporation may transact any business which might have been transacted at the original meeting.

1.8 Proxies. Each stockholder of record entitled to vote at a meeting of stockholders may vote in person (including by means of remote communications, if any, by which stockholders may be deemed to be present in person and vote at such meeting) or may authorize another person or persons to vote for such stockholder by a proxy executed or transmitted in a manner permitted by applicable law. No such proxy shall be voted upon after three years from the date of its execution, unless the proxy expressly provides for a longer period. A proxy shall be irrevocable if it states that it is irrevocable and if, and only as long as, it is coupled with an interest sufficient in

law to support an irrevocable power. A stockholder may revoke any proxy which is not irrevocable by attending the meeting and voting in person or by delivering to the Secretary of the Corporation at the principal executive offices of the Corporation as set forth on the cover page of the Corporation's most recent public filing with the Securities and Exchange Commission (the "SEC") (with a copy via email to stockholdercommunication@five9.com) a revocation of the proxy or a new proxy bearing a later date. Any stockholder directly or indirectly soliciting proxies from other stockholders must use a proxy card color other than white, which shall be reserved for exclusive use by the Board.

1.9 Action at Meeting. When a quorum is present at any meeting, any matter other than the election of directors to be voted upon by the stockholders at such meeting shall be decided by the vote of the holders of shares of stock having a majority in voting power of the votes cast by the holders of all of the shares of stock present or represented at the meeting and voting affirmatively or negatively on such matter (or if there are two (2) or more classes or series of stock entitled to vote as separate classes, then in the case of each such class or series, the holders of a majority in voting power of the shares of stock of that class or series present or represented at the meeting and voting affirmatively or negatively on such matter), except when a different vote is required by applicable law, regulation applicable to the Corporation or its securities, the rules or regulations of any stock exchange applicable to the Corporation, the Certificate of Incorporation or these Bylaws, in which case such different vote shall be the applicable vote on the matter. Voting at meetings of stockholders need not be by written ballot. At all meetings of stockholders for the election of directors at which a quorum is present a plurality of the votes cast shall be sufficient to elect.

1.10 Notice of Stockholder Business and Nominations.

(A) Annual Meetings of Stockholders. (1) Nominations of persons for election to the Board and the proposal of other business to be considered by the stockholders may be made at an annual meeting of stockholders only (a) pursuant to the Corporation's notice of meeting (or any supplement thereto), (b) by or at the direction of the Board or any committee thereof or (c) by any stockholder of the Corporation who was a stockholder of record of the Corporation at the time the notice provided for in this Section 1.10 is delivered to the Secretary of the Corporation at the principal executive offices of the Corporation as set forth on the cover page of the Corporation's most recent public filing with the SEC (with a copy via email to stockholdercommunication@five9.com), who is a stockholder of record of the Corporation at the time of the annual meeting, who is entitled to vote at the annual meeting (and, in the case of a nomination, is entitled to vote at the annual meeting on such election) and who complies with the notice procedures set forth in this Section 1.10.

(2) For any nominations or other business to be properly brought before an annual meeting by a stockholder pursuant to clause (c) of paragraph (A)(1) of this Section 1.10, the stockholder must have given timely notice thereof in writing in the proper form, in accordance with this Section 1.10, to the Secretary of the Corporation and any such proposed business (other than the nominations of persons for election to the Board) must constitute a proper matter for stockholder action. To be timely, a stockholder's notice shall be delivered to the Secretary of the Corporation at the principal executive offices of the Corporation as set forth on the cover page of the Corporation's most recent public filing with the SEC (with a copy via email to

stockholdercommunication@five9.com) not later than the close of business on the ninetieth (90th) day, nor earlier than the close of business on the one hundred twentieth (120th) day, prior to the first anniversary of the preceding year's annual meeting (provided, however, that in the event that the date of the annual meeting is more than thirty (30) days before or more than seventy (70) days after such anniversary date, notice by the stockholder must be so delivered not earlier than the close of business on the one hundred twentieth (120th) day prior to such annual meeting and not later than the close of business on the later of the ninetieth (90th) day prior to such annual meeting or the tenth (10th) day following the day on which public announcement of the date of such meeting is first made by the Corporation). In no event shall the public announcement of an adjournment or postponement of an annual meeting commence a new time period (or extend any time period) for the giving of a stockholder's notice as described above. The number of nominees a stockholder may nominate for election at the annual meeting (or in the case of a stockholder giving the notice on behalf of an Associated Person, the number of nominees a stockholder may nominate for election at the annual meeting on behalf of such Associated Person) shall not exceed the number of directors to be elected at such annual meeting. To be in proper form, a stockholder's notice must be to the Secretary of the Corporation at the principal executive offices of the Corporation as set forth on the cover page of the Corporation's most recent public filing with the SEC (with a copy via email to stockholdercommunication@five9.com) and set forth in writing: (a) as to each person whom the stockholder or Associated Person proposes to nominate for election as a director (i) all information with respect to such proposed nominee that would be required to be set forth in such notice pursuant to clause (c) of this sentence if such proposed nominee were an Associated Person, (ii) all information relating to such person that is required to be disclosed in solicitations of proxies for election of directors in an election contest, or is otherwise required, in each case pursuant to and in accordance with Section 14(a) of the Securities Exchange Act of 1934, as amended (the "Exchange Act"), and the rules and regulations promulgated thereunder, including such person's written consent to being named in the Corporation's proxy statement and associated proxy card as a nominee of the stockholder or Associated Person and to serving as a director if elected; and (iii) a reasonably detailed description of all direct and indirect compensation and other material monetary agreements, arrangements or understandings during the past three (3) years, and any other material relationships, between or among such stockholder or any Associated Person and its and their affiliates and associates, or others acting in concert therewith, on the one hand, and each proposed nominee and his or her affiliates, associates or others acting in concert therewith, on the other hand, including all information that would be required to be disclosed pursuant to Items 403 and 404 under Regulation S-K if the stockholder or any Associated Person were the "registrant" for purposes of such rule and the proposed nominee were a director or executive officer of such registrant, (b) as to any other business that the stockholder or any Associated Person proposes to bring before the annual meeting, (i) a description in reasonable detail of the business desired to be brought before the annual meeting, (ii) the text of the proposal or business (including the text of any resolutions proposed for consideration and in the event that such business includes a proposal to amend the Bylaws of the Corporation, the language of the proposed amendment), (iii) a description in reasonable detail of the reasons for conducting such business at the annual meeting and the reasons that the conducting of such business and the taking of the action or actions proposed to be taken would be in the best interest of the Corporation and its stockholders, and (iv) a description in reasonable detail of any material interest in such business of the stockholder or any Associated Person, and (v) a description in reasonable detail of all agreements, arrangements and understandings between or among the stockholder and any Associated Person or between or

among the stockholder or any Associated Person and any other person or entity (including their names) in connection with the proposal; and (c) as to the stockholder providing notice and any Associated Person (i) the name and address of such person, (ii) the class or series and number of shares of capital stock of the Corporation which are owned beneficially and of record by the stockholder and any Associated Person, (iii) a description of any agreement, arrangement or understanding with respect to the nomination or proposal between or among such stockholder and/or such Associated Person, any of their respective affiliates or associates, and any others acting in concert with any of the foregoing (including their names), including, in the case of a nomination, the nominee, (iv) a description of any agreement, arrangement or understanding (including any derivative or short positions, profit interests, options, warrants, convertible securities, stock appreciation or similar rights, hedging transactions, and borrowed or loaned shares) that has been entered into as of the date of the stockholder's notice by, or on behalf of, such stockholder and such Associated Person whether or not such instrument or right shall be subject to settlement in underlying shares of capital stock of the the effect or intent of which is to mitigate loss to, manage risk or benefit of share price changes for, or increase or decrease the voting power of, such stockholder or such Associated Person, with respect to securities of the Corporation, (v) a representation that the stockholder is a holder of record of stock of the Corporation entitled to vote at such meeting and intends to appear in person or by proxy at the annual meeting to propose such business or nomination, (vi) a representation as to whether the stockholder or any Associated Person intends, or is part of a group which intends (A) to deliver a proxy statement and/or form of proxy to holders of at least the percentage of the Corporation's outstanding capital stock required to approve or adopt the proposal or elect the nominee, (B) engage in or be a participant in a solicitation (within the meaning of Rule 14a-1(l) under the Exchange Act) with respect to the proposal and, if so, the name of each participant (as defined in Item 4 of Schedule 14A under the Exchange Act) in such solicitation or (C) in the case of a nomination, to solicit proxies in support of nominees other than the nominees by or at the direction of the Board or a committee thereof in accordance with Rule 14a-19 under the Exchange Act, (vii) for any such stockholder whose notice indicates that the stockholder or any Associated Person intends, or is part of a group that intends, to solicit proxies in support of nominees other than the nominees by or at the direction of the Board or a duly authorized committee thereof in accordance with Rule 14a-19 under the Exchange Act, a written agreement (in the form provided by the Secretary of the Corporation upon written request), on behalf of such stockholder and any Associated Person, and any group of which it is a member, pursuant to which such person acknowledges and agrees that (A) the Corporation shall disregard any proxies or votes solicited for such person's nominees and the nominees of any group of which the person is a member if such person (1) notifies the Corporation that such person no longer intends, or is part of a group that no longer intends, to solicit proxies in support of nominees other than the nominees of the Board or a committee thereof in accordance with Rule 14a-19 under the Exchange Act or (2) fails to comply with Rules 14a-19(a)(2) and (3) under the Exchange Act (or with the interpretation of such requirements by the SEC with respect to special meetings, if applicable), and (B) if any such person provides notice pursuant to Rule 14a-19(a)(1) under the Exchange Act, such person shall deliver to the Secretary of the Corporation at the principal executive offices of the Corporation as set forth on the cover page of the Corporation's most recent public filing with the SEC (with a copy via email to stockholdercommunication@five9.com), no later than five (5) business days prior to the annual meeting, reasonable documentary evidence (as determined by the Corporation or one of its representatives in good faith) that the requirements of Rule 14a-19(a)(3) under the Exchange Act have been satisfied, and (viii) any other information

relating to such stockholder and any Associated Person required to be disclosed in a proxy statement or other filings required to be made in connection with solicitations of proxies for, as applicable, the proposal and/or for the election of directors in an election contest pursuant to and in accordance with Section 14(a) of the Exchange Act and the rules and regulations promulgated thereunder. The foregoing notice requirements of this paragraph (A) of this Section 1.10 shall be deemed satisfied by a stockholder with respect to business other than a nomination if the stockholder has notified the Corporation of his, her or its intention to present a proposal at an annual meeting in compliance with applicable rules and regulations promulgated under the Exchange Act and such stockholder's proposal (or any proposal on behalf of any Associated Person) has been included in a proxy statement that has been prepared by the Corporation to solicit proxies for such annual meeting. The Corporation may require any stockholder and any Associated Person to furnish such other information as may be reasonably required by the Corporation or one of its representatives in good faith to determine such person's compliance with these Bylaws or the accuracy and completeness of any notice or solicitation given or made on behalf of such person, which information shall be provided within ten (10) calendar days after the Corporation's request. The Corporation may require any proposed nominee to furnish such other information as may reasonably be required by the Corporation or one of its representatives in good faith to determine the qualifications and eligibility of such proposed nominee to serve as a director of the Corporation, which information shall be provided within ten (10) calendar days after the Corporation's request. For purposes of this Section 1.10, "Associated Person" shall mean each (i) beneficial owner or beneficial owners, if different than the stockholder providing notice, on whose behalf the notice of nomination proposed to be made at the annual meeting is given and (ii) Affiliate and Associate (each within the meaning of Rule 12b-2 under the Exchange Act) of such stockholder or beneficial owner.

(3) The stockholder providing notice shall, from time to time, update and supplement any of the foregoing information to reflect any change so that such information is true and correct as of the record date and as of the date that is ten (10) calendar days prior to the meeting or any recess, adjournment or postponement thereof by delivering, as promptly as practicable, but, in any event, no later than ten (10) calendar days after the record date and five (5) calendar days prior to the meeting or any recess, adjournment or postponement thereof, respectively, a notice in writing of such updated and supplemented information to the Secretary of the Corporation at the principal executive offices of the Corporation as set forth on the cover page of the Corporation's most recent public filing with the SEC (with a copy via email to stockholdercommunication@five9.com). For the avoidance of doubt, any information provided pursuant to this Section 1.10(A)(3) shall not, and shall not be deemed to, cure any deficiencies in any stockholder's notice, extend any applicable deadlines under these Bylaws or enable or be deemed to permit such stockholder to amend any proposal or nomination or to submit any new or change or add proposals or nominees proposed to be brought before a meeting, except as otherwise set forth in these Bylaws.

(4) Notwithstanding anything in the second sentence of paragraph (A)(2) of this Section 1.10 to the contrary, in the event that the number of directors to be elected to the Board at the annual meeting is increased effective after the time period for which nominations would otherwise be due under paragraph (A)(2) of this Section 1.10 and there is no public announcement by the Corporation naming the nominees for the additional directorships at least one hundred (100) days prior to the first anniversary of the preceding year's annual meeting, a stockholder's notice

required by this Section 1.10 shall also be considered timely, but only with respect to nominees for the additional directorships, if it shall be delivered to the Secretary of the Corporation at the principal executive offices of the Corporation as set forth on the cover page of the Corporation's most recent public filing with the SEC (with a copy via email to stockholdercommunication@five9.com) not later than the close of business on the tenth (10th) day following the day on which such public announcement is first made by the Corporation.

(B) Special Meetings of Stockholders. Only such business shall be conducted at a special meeting of stockholders as shall have been brought before the special meeting pursuant to the Corporation's notice of meeting. Nominations of persons for election to the Board may be made at a special meeting of stockholders at which directors are to be elected pursuant to the Corporation's notice of meeting (1) by or at the direction of the Board or any committee thereof or (2) provided that the Board has determined that directors shall be elected at such special meeting, by any stockholder of the Corporation who is a stockholder of record at the time the notice provided for in this Section 1.10 is delivered to the Secretary of the Corporation, who is entitled to vote at the special meeting and upon such election and who complies with the notice procedures set forth in this Section 1.10 as applied to a special meeting. The number of nominees a stockholder may nominate for election at the special meeting (or in the case of a stockholder giving the notice on behalf of an Associated Person, the number of nominees a stockholder may nominate for election at the special meeting on behalf of such Associated Person) shall not exceed the number of directors to be elected at such special meeting. In the event the Corporation calls a special meeting of stockholders for the purpose of electing one or more directors to the Board, any such stockholder entitled to vote in such election of directors may nominate a person or persons (as the case may be) for election to such position(s) as specified in the Corporation's notice of meeting, if the stockholder's notice required by paragraph (A)(2) of this Section 1.10 shall be delivered to the Secretary at the principal executive offices of the Corporation as set forth on the cover page of the Corporation's most recent public filing with the SEC (with a copy via email to stockholdercommunication@five9.com) not earlier than the close of business on the one hundred twentieth (120th) day prior to such special meeting and not later than the close of business on the later of the ninetieth (90th) day prior to such special meeting or the tenth (10th) day following the day on which the Corporation first makes a public announcement of the date of the special meeting at which directors are to be elected. In no event shall the public announcement of an adjournment or postponement of a special meeting commence a new time period (or extend any time period) for the giving of a stockholder's notice as described above.

(C) General. (1) Except as otherwise expressly provided in any applicable rule or regulation promulgated under the Exchange Act, only such persons who are nominated in accordance with the procedures set forth in this Section 1.10 shall be eligible to be elected at an annual or special meeting of stockholders of the Corporation to serve as directors and only such business shall be conducted at a meeting of stockholders as shall have been brought before the meeting in accordance with the procedures set forth in this Section 1.10. Except as otherwise provided by law, the chairman of the meeting shall have the power and duty (a) to determine whether a nomination or any business proposed to be brought before the meeting was made or proposed, as the case may be, in accordance with the procedures set forth in this Section 1.10 (including whether the stockholder or Associated Person on whose behalf the nomination or proposal is made, solicited (or is part of a group which solicited) or did not so solicit, as the case may be, proxies or votes in support of such stockholder's nominee or proposal in compliance with

such stockholder's representation as required by clause (A)(2)(c)(xii) of this Section 1.10 or Rule 14a-19 under the Exchange Act) and (b) if any proposed nomination or business was not made or proposed in compliance with this Section 1.10, to declare that such nomination shall be disregarded or that such proposed business shall not be transacted. Notwithstanding the foregoing provisions of this Section 1.10, unless otherwise required by law, if the stockholder (or a qualified representative of the stockholder) does not appear at the annual or special meeting of stockholders of the Corporation to present a nomination or proposed business, such nomination shall be disregarded and such proposed business shall not be transacted, notwithstanding that proxies in respect of such vote may have been received by the Corporation. For purposes of this Section 1.10, to be considered a qualified representative of the stockholder, a person must be a duly authorized officer, manager or partner of such stockholder or must be authorized by a writing executed by such stockholder or an electronic transmission delivered by such stockholder to act for such stockholder as proxy at the meeting of stockholders and such person must produce such writing or electronic transmission, or a reliable reproduction of the writing or electronic transmission, at the meeting of stockholders.

(2) For purposes of this Section 1.10, "public announcement" shall include disclosure in a press release reported by the Dow Jones News Service, Associated Press or other national news service or in a document publicly filed by the Corporation with the SEC pursuant to Section 13, 14 or 15(d) of the Exchange Act and the rules and regulations promulgated thereunder.

(3) Notwithstanding the foregoing provisions of this Section 1.10, a stockholder shall also comply with all applicable requirements of the Exchange Act and the rules and regulations promulgated thereunder with respect to the matters set forth in this Section 1.10; provided however, that any references in these Bylaws to the Exchange Act or the rules and regulations promulgated thereunder are not intended to and shall not limit any requirements applicable to nominations or proposals as to any other business to be considered pursuant to this Section 1.10 (including paragraphs (A)(1)(c) and (B) hereof), and compliance with paragraphs (A)(1)(c) and (B) of this Section 1.10 shall be the exclusive means for a stockholder to make nominations or submit other business (other than, as provided in paragraph (A)(2) of this Section 1.10, business other than nominations brought properly under and in compliance with Rule 14a-8 of the Exchange Act, as may be amended from time to time). Nothing in this Section 1.10 shall be deemed to affect any rights (a) of stockholders to request inclusion of proposals or nominations in the Corporation's proxy statement pursuant to applicable rules and regulations promulgated under the Exchange Act or (b) of the holders of any series of Preferred Stock to elect directors pursuant to any applicable provisions of the Certificate of Incorporation.

(4) Unless otherwise required by law, if (a) any stockholder or Associated Person provides notice pursuant to Rule 14a-19(a)(1) under the Exchange Act and (b) such person subsequently either (i) notifies the Corporation that such person no longer intends to, or is part of a group that no longer intends to, solicit proxies in support of nominees other than the nominees by or at the direction the Board or a committee thereof in accordance with Rule 14a-19 under the Exchange Act or (ii) fails to comply with the requirements of Rules 14a-19(a)(2) and (3) under the Exchange Act (or with the interpretation of such requirements by the SEC with respect to special meetings, if applicable), then the Corporation shall disregard any proxies or votes solicited for such person's nominees, notwithstanding that proxies or votes in favor thereof may have been received by the Corporation. If any such person provides notice pursuant to Rule 14a-19(a)(1)

under the Exchange Act, such person shall deliver to the Secretary of the Corporation at the principal executive offices of the Corporation as set forth on the cover page of the Corporation's most recent public filings with the SEC (with a copy via email to stockholdercommunication@five9.com), no later than five (5) business days prior to the applicable meeting, reasonable documentary evidence (as determined by the Corporation or one of its representatives in good faith) that the requirements of Rule 14a-19(a)(3) under the Exchange Act have been satisfied.

(5) A stockholder or Associated Person submitting a notice pursuant to this Section 1.10, by its delivery to the Corporation, represents and warrants that all information contained therein (including any information regarding any stockholder or Associated Person or candidate whom such person proposes to nominate for election as a director), as of the deadline for submitting the notice, is true, accurate and complete in all respects, contains no false or misleading statements and such person acknowledges that it intends for the Corporation and the Board to rely on such information as (a) being true, accurate and complete in all respects and (b) not containing any false or misleading statements. If the information submitted pursuant to this Section 1.10 by any stockholder or Associated Person shall not be true, correct, and complete in all respects prior to the deadline for submitting the notice, such information may be deemed not to have been provided in accordance with this Section 1.10.

1.11 Conduct of Meetings.

(A) Meetings of stockholders shall be presided over by the Chairman of the Board, if any, or in the Chairman's absence by the Vice Chairman of the Board, if any, or in the Vice Chairman's absence by the Chief Executive Officer, or in the Chief Executive Officer's absence, by the President, or in the President's absence by a Vice President, or in the absence of all of the foregoing persons by a chairman designated by the Board. The Secretary shall act as secretary of the meeting, but in the Secretary's absence the chairman of the meeting may appoint any person to act as secretary of the meeting.

(B) The Board may adopt by resolution such rules, regulations and procedures for the conduct of any meeting of stockholders of the Corporation as it shall deem appropriate including, without limitation, such guidelines and procedures as it may deem appropriate regarding the participation by means of remote communication of stockholders and proxyholders not physically present at a meeting. Except to the extent inconsistent with such rules, regulations and procedures as adopted by the Board, the chairman of any meeting of stockholders shall have the right and authority to convene and (for any or no reason) to recess and/or adjourn the meeting, to prescribe such rules, regulations and procedures and to do all such acts as, in the judgment of such chairman, are appropriate for the proper conduct of the meeting. Such rules, regulations or procedures, whether adopted by the Board or prescribed by the chairman of the meeting, may include, without limitation, the following: (i) the establishment of an agenda or order of business for the meeting; (ii) rules and procedures for maintaining order at the meeting and the safety of those present; (iii) limitations on attendance at or participation in the meeting to stockholders of record of the Corporation, their duly authorized and constituted proxies or such other persons as shall be determined; (iv) restrictions on entry to the meeting after the time fixed for the commencement thereof; (v) limitations on the time allotted to questions or comments by participants, (vi) ruling on all procedural questions that may arise during or in connection with the meeting, and (vii)

determining whether any nomination or business proposed to be brought before the meeting has been properly brought before the meeting. Unless and to the extent determined by the Board or the chairman of the meeting, meetings of stockholders shall not be required to be held in accordance with the rules of parliamentary procedure.

(C) The chairman of the meeting shall announce at the meeting when the polls for each matter to be voted upon at the meeting will be opened and closed. After the polls close, no ballots, proxies or votes or any revocations or changes thereto may be accepted.

(D) In advance of any meeting of stockholders, the Board, the Chairman of the Board, the Chief Executive Officer or the President shall appoint one or more inspectors of election to act at the meeting and make a written report thereof. One or more other persons may be designated as alternate inspectors to replace any inspector who fails to act. If no inspector or alternate is present, ready and willing to act at a meeting of stockholders, the chairman of the meeting shall appoint one or more inspectors to act at the meeting. Unless otherwise required by law, inspectors may be officers, employees or agents of the Corporation. Each inspector, before entering upon the discharge of such inspector's duties, shall take and sign an oath faithfully to execute the duties of inspector with strict impartiality and according to the best of such inspector's ability. The inspector shall have the duties prescribed by law and, when the vote is completed, shall make a certificate of the result of the vote taken and of such other facts as may be required by law. Every vote taken by ballots shall be counted by a duly appointed inspector or duly appointed inspectors.

ARTICLE II

DIRECTORS

2.1 General Powers. The business and affairs of the Corporation shall be managed by or under the direction of a Board, who may exercise all of the powers of the Corporation except as otherwise provided by law or the Certificate of Incorporation.

2.2 Number, Election and Qualification. The total number of directors constituting the Board shall be as fixed in, or in the manner provided by, the Certificate of Incorporation. Election of directors need not be by written ballot. Directors need not be stockholders of the Corporation.

2.3 Chairman of the Board; Vice Chairman of the Board. The Board may appoint from its members a Chairman of the Board and a Vice Chairman of the Board, neither of whom need be an employee or officer of the Corporation. If the Board appoints a Chairman of the Board, such Chairman shall perform such duties and possess such powers as are assigned by the Board and, if the Chairman of the Board is also designated as the Corporation's Chief Executive Officer, shall have the powers and duties of the Chief Executive Officer prescribed in Section 3.7 of these Bylaws. If the Board appoints a Vice Chairman of the Board, such Vice Chairman shall perform such duties and possess such powers as are assigned by the Board. Unless otherwise provided by the Board, the Chairman of the Board or, in the Chairman's absence, the Vice Chairman of the Board, if any, shall preside at all meetings of the Board.

2.4 Classes of Directors. Subject to the rights of holders of any series of Preferred Stock to elect directors, the Board shall be and is divided into three (3) classes, designated: Class I, Class

II and Class III. Each class shall consist, as nearly as may be possible, of one-third of the total number of directors constituting the entire Board. If the number of such directors is changed, any increase or decrease shall be apportioned among the classes so as to maintain the number of directors in each class as nearly equal as possible, and any such additional director of any class elected to fill a newly created directorship resulting from an increase in such class shall hold office for a term that shall coincide with the remaining term of that class, but in no case shall a decrease in the number of directors remove or shorten the term of any incumbent director.

2.5 Terms of Office. Subject to the rights of holders of any series of Preferred Stock to elect directors, each director shall serve for a term ending on the date of the third (3rd) annual meeting of stockholders following the annual meeting of stockholders at which such director was elected; provided, that the term of each director shall continue until the election and qualification of his or her successor, subject to his or her earlier death, disability, disqualification, resignation or removal.

2.6 Quorum. The greater of (a) a majority of the directors at any time in office and (b) one-third of the whole Board shall constitute a quorum of the Board. If at any meeting of the Board there shall be less than a quorum, a majority of the directors present may adjourn the meeting from time to time without further notice other than announcement at the meeting, until a quorum shall be present.

2.7 Action at Meeting. Every act or decision done or made by a majority of the directors present at a meeting duly held at which a quorum is present shall be regarded as the act of the Board, unless a greater number is required by law or by the Certificate of Incorporation.

2.8 Removal. Subject to the rights of holders of any series of Preferred Stock, directors of the Corporation may be removed only as expressly provided in the Certificate of Incorporation.

2.9 Vacancies. Subject to the provisions of the Certificate of Incorporation and the rights of holders of any series of Preferred Stock, any newly created directorship that results from an increase in the number of directors or any vacancy on the Board that results from the death, disability, resignation, disqualification or removal of any director or from any other cause shall be filled solely by the affirmative vote of a majority of the directors then in office, even if less than a quorum, or by a sole remaining director and shall not be filled by the stockholders. Any director elected to fill a vacancy not resulting from an increase in the number of directors shall hold office for the remaining term of his or her predecessor.

2.10 Resignation. Any director may resign by delivering a resignation in writing or by electronic transmission to the Corporation at its principal office or to the Chairman of the Board, the Chief Executive Officer, the President or the Secretary. Such resignation shall be effective upon delivery unless it is specified to be effective at some later time or upon the happening of some later event.

2.11 Regular Meetings. Regular meetings of the Board may be held without notice at such time and place as shall be determined from time to time by the Board; provided that any director who is absent when such a determination is made shall be given notice of the

determination. A regular meeting of the Board may be held without notice immediately after and at the same place as the annual meeting of stockholders.

2.12 Special Meetings. Special meetings of the Board may be called by the Chairman of the Board, the Chief Executive Officer, a majority of the directors then in office, or by one director in the event that there is only a single director in office.

2.13 Notice of Special Meetings. Notice of the date, place and time of any special meeting of the Board shall be given to each director by the Secretary or by the officer or one of the directors calling the meeting. Notice shall be duly given to each director (a) in person or by telephone at least twenty-four (24) hours in advance of the meeting, (b) by sending written notice by reputable overnight courier, telecopy, facsimile or other means of electronic transmission, or delivering written notice by hand, to such director's last known business, home or means of electronic transmission address at least twenty-four (24) hours in advance of the meeting, or (c) by sending written notice by first-class mail to such director's last known business or home address at least seventy-two (72) hours in advance of the meeting. A notice or waiver of notice of a meeting of the Board need not specify the purposes of the meeting.

2.14 Meetings by Conference Communications Equipment. Directors may participate in meetings of the Board or any committee thereof by means of conference telephone or other communications equipment by means of which all persons participating in the meeting can hear each other, and participation by such means shall constitute presence in person at such meeting.

2.15 Action by Consent. Any action required or permitted to be taken at any meeting of the Board or of any committee thereof may be taken without a meeting, if all members of the Board or committee, as the case may be, consent to the action in writing or by electronic transmission. After an action is taken, the consent or consents relating thereto shall be filed with the minutes of proceedings of the Board, or the committee thereof, in the same paper or electronic form as the minutes are maintained.

2.16 Committees. The Board may designate one or more committees, each committee to consist of one or more of the directors of the Corporation with such lawfully delegable powers and duties as the Board thereby confers, to serve at the pleasure of the Board. The Board may designate one or more directors as alternate members of any committee, who may replace any absent or disqualified member at any meeting of the committee. In the absence or disqualification of a member of a committee, the member or members of the committee present at any meeting and not disqualified from voting, whether or not such member or members constitute a quorum, may unanimously appoint another member of the Board to act at the meeting in the place of any such absent or disqualified member. Any such committee, to the extent provided in the resolution of the Board and subject to the provisions of law, shall have and may exercise all the powers and authority of the Board in the management of the business and affairs of the Corporation and may authorize the seal of the Corporation to be affixed to all papers which may require it. Each such committee shall keep minutes and make such reports as the Board may from time to time request. Except as the Board may otherwise determine, any committee may make rules for the conduct of its business, but unless otherwise provided by the directors or in such rules, its business shall be conducted as nearly as possible in the same manner as is provided in these Bylaws for the Board. Except as otherwise provided in the Certificate of Incorporation, these Bylaws, or the resolution of the Board

designating the committee, a committee may create one or more subcommittees, each subcommittee to consist of one or more members of the committee, and delegate to a subcommittee any or all of the powers and authority of the committee.

2.17 Compensation of Directors. Directors may be paid such compensation for their services and such reimbursement for expenses of attendance at meetings as the Board may from time to time determine. No such payment shall preclude any director from serving the Corporation or any of its parent or subsidiary entities in any other capacity and receiving compensation for such service.

ARTICLE III

OFFICERS

3.1 Titles. The officers of the Corporation may consist of a Chief Executive Officer, a President, a Chief Financial Officer, a Treasurer and a Secretary and such other officers with such other titles as the Board shall from time to time determine. The Board may appoint such other officers, including one or more Vice Presidents and one or more Assistant Treasurers or Assistant Secretaries, as it may deem appropriate from time to time. The only individuals who shall be considered the officers of the Corporation shall be those individuals who have been appointed or elected as an officer of the Corporation by the Board.

3.2 Election. The officers of the Corporation shall be elected annually by the Board.

3.3 Qualification. No officer need be a stockholder. Any two (2) or more offices may be held by the same person.

3.4 Tenure. Except as otherwise provided by law, by the Certificate of Incorporation or by these Bylaws, each officer shall hold office until such officer's successor is duly elected and qualified, unless a different term is specified in the resolution electing or appointing such officer, or until such officer's earlier death, resignation, disqualification or removal.

3.5 Resignation and Removal. Any officer may resign by delivering a written resignation to the Corporation at its principal office or to the Board, the Chief Executive Officer, the President or the Secretary. Such resignation shall be effective upon receipt unless it is specified to be effective at some later time or upon the happening of some later event. Any officer may be removed at any time, with or without cause, by the affirmative vote of a majority of the directors then in office. Except as the Board may otherwise determine, no officer who resigns or is removed shall have any right to any compensation as an officer for any period following such officer's resignation or removal, or any right to damages on account of such removal, whether such officer's compensation be by the month or by the year or otherwise, unless such compensation is expressly provided for in a duly authorized written agreement with the Corporation.

3.6 Vacancies. The Board may fill any vacancy occurring in any office for any reason and may, in its discretion, leave unfilled, for such period as it may determine, any offices. Each such successor shall hold office for the unexpired term of such officer's predecessor and until a

successor is duly elected and qualified, or until such officer's earlier death, resignation, disqualification or removal.

3.7 President; Chief Executive Officer. Unless the Board has designated another person as the Corporation's Chief Executive Officer, the President shall be the Chief Executive Officer of the Corporation. The Chief Executive Officer shall have general charge and supervision of the business of the Corporation subject to the direction of the Board, and shall perform all duties and have all powers that are commonly incident to the office of chief executive or that are delegated to such officer by the Board. The President shall perform such other duties and shall have such other powers as the Board or the Chief Executive Officer (if the President is not the Chief Executive Officer) may from time to time prescribe. In the event of the absence, inability or refusal to act of the Chief Executive Officer or the President (if the President is not the Chief Executive Officer), the Vice President (or if there shall be more than one, the Vice Presidents in the order determined by the Board) shall perform the duties of the Chief Executive Officer and when so performing such duties shall have all the powers of and be subject to all the restrictions upon the Chief Executive Officer.

3.8 Vice Presidents/Other Officers. Each Vice President and any other officer designated by the Board shall perform such duties and possess such powers as the Board or the Chief Executive Officer may from time to time prescribe. The Board may assign to any Vice President the title of Executive Vice President or Senior Vice President, and may assign to any Vice President or other officer any other title selected by the Board.

3.9 Secretary and Assistant Secretaries. The Secretary shall perform such duties and shall have such powers as the Board or the Chief Executive Officer may from time to time prescribe. In addition, the Secretary shall perform such duties and have such powers as are incident to the office of the secretary, including without limitation the duty and power to give notices of all meetings of stockholders and special meetings of the Board, to attend all meetings of stockholders and the Board and keep a record of the proceedings, to maintain a stock ledger and prepare lists of stockholders and their addresses as required, to be custodian of corporate records and the corporate seal and to affix and attest to the same on documents.

Any Assistant Secretary shall perform such duties and possess such powers as the Board, the Chief Executive Officer or the Secretary may from time to time prescribe. In the event of the absence, inability or refusal to act of the Secretary, the Assistant Secretary (or if there shall be more than one, the Assistant Secretaries in the order determined by the Board) shall perform the duties and exercise the powers of the Secretary.

The chairman of any meeting of the Board or of stockholders may designate a temporary secretary to keep a record of any meeting.

3.10 Treasurer and Assistant Treasurers. The Treasurer shall perform such duties and shall have such powers as may from time to time be assigned by the Board or the Chief Executive Officer. In addition, the Treasurer shall perform such duties and have such powers as are incident to the office of treasurer, including without limitation the duty and power to keep and be responsible for all funds and securities of the Corporation, to deposit funds of the Corporation in depositories selected in accordance with these Bylaws, to disburse such funds as ordered by the

Board, to make proper accounts of such funds, and to render as required by the Board statements of all such transactions and of the financial condition of the Corporation.

The Assistant Treasurers shall perform such duties and possess such powers as the Board, the Chief Executive Officer or the Treasurer may from time to time prescribe. In the event of the absence, inability or refusal to act of the Treasurer, the Assistant Treasurer (or if there shall be more than one, the Assistant Treasurers in the order determined by the Board) shall perform the duties and exercise the powers of the Treasurer.

3.11 Salaries. Officers of the Corporation shall be entitled to such salaries, compensation or reimbursement as shall be fixed or allowed from time to time by the Board.

3.12 Delegation of Authority. The Board may from time to time delegate the powers or duties of any officer to any other officer or agent, notwithstanding any provision hereof.

ARTICLE IV

CAPITAL STOCK

4.1 Issuance of Stock. Subject to the provisions of the Certificate of Incorporation, the whole or any part of any unissued balance of the authorized capital stock of the Corporation or the whole or any part of any shares of the authorized capital stock of the Corporation held in the Corporation's treasury may be issued, sold, transferred or otherwise disposed of by vote of the Board in such manner, for such lawful consideration and on such terms as the Board may determine.

4.2 Stock Certificates; Uncertificated Shares. The shares of the Corporation shall be represented by certificates, provided that the Board may provide by resolution or resolutions that some or all of any or all classes or series of the Corporation's stock shall be uncertificated shares. Every holder of stock of the Corporation represented by certificates shall be entitled to have a certificate, in such form as may be prescribed by law and by the Board, representing the number of shares held by such holder registered in certificate form. Each such certificate shall be signed in a manner that complies with Section 158 of the DGCL.

Each certificate for shares of stock which are subject to any restriction on transfer pursuant to the Certificate of Incorporation, these Bylaws, applicable securities laws or any agreement among any number of stockholders or among such holders and the Corporation shall have conspicuously noted on the face or back of the certificate either the full text of the restriction or a statement of the existence of such restriction.

If the Corporation shall be authorized to issue more than one class of stock or more than one series of any class, the powers, designations, preferences and relative participating, optional or other special rights of each class of stock or series thereof and the qualifications, limitations or restrictions of such preferences and/or rights shall be set forth in full or summarized on the face or back of each certificate representing shares of such class or series of stock, provided that in lieu of the foregoing requirements there may be set forth on the face or back of each certificate representing shares of such class or series of stock a statement that the Corporation will furnish without charge to each stockholder who so requests the powers, designations, preferences and

relative, participating, optional or other special rights of each class of stock or series thereof and the qualifications, limitations or restrictions of such preferences and/or rights.

Within a reasonable time after the issuance or transfer of uncertificated shares, the registered owner thereof shall be given a notice, in writing or by electronic transmission, containing the information required to be set forth or stated on certificates pursuant to Sections 151, 156, 202(a) or 218(a) of the DGCL or, with respect to Section 151 of DGCL, a statement that the Corporation will furnish without charge to each stockholder who so requests the powers, designations, preferences and relative participating, optional or other special rights of each class of stock or series thereof and the qualifications, limitations or restrictions of such preferences and/or rights.

The Corporation will be entitled to treat the person in whose name any share of its stock is registered as the owner thereof for all purposes, and will not be bound to recognize any equitable or other claim to, or interest in, such share on the part of any other person, whether or not the Corporation has notice thereof, except as expressly provided by applicable law.

4.3 Transfers. Shares of stock of the Corporation shall be transferable in the manner prescribed by law, the Certificate of Incorporation and in these Bylaws. Transfers of shares of stock of the Corporation shall be made only on the books of the Corporation or by transfer agents designated to transfer shares of stock of the Corporation. Subject to applicable law, shares of stock represented by certificates shall be transferred only on the books of the Corporation by the surrender to the Corporation or its transfer agent of the certificate representing such shares properly endorsed or accompanied by a written assignment or power of attorney properly executed, and with such proof of authority or the authenticity of signature as the Corporation or its transfer agent may reasonably require. Except as may be otherwise required by law, by the Certificate of Incorporation or by these Bylaws, the Corporation shall be entitled to treat the record holder of stock as shown on its books as the owner of such stock for all purposes, including the payment of dividends and the right to vote with respect to such stock, regardless of any transfer, pledge or other disposition of such stock until the shares have been transferred on the books of the Corporation in accordance with the requirements of these Bylaws.

4.4 Lost, Stolen or Destroyed Certificates. The Corporation may issue a new certificate or uncertificated shares in place of any previously issued certificate alleged to have been lost, stolen or destroyed, upon such terms and conditions as the Board may prescribe, including the presentation of reasonable evidence of such loss, theft or destruction and the giving of such indemnity and posting of such bond as the Board may require for the protection of the Corporation or any transfer agent or registrar.

4.5 Record Date. In order that the Corporation may determine the stockholders entitled to notice of any meeting of stockholders or any adjournment thereof, the Board may fix a record date, which record date shall not precede the date upon which the resolution fixing the record date is adopted by the Board, and which record date shall, unless otherwise required by law, not be more than sixty (60) nor less than ten (10) days before the date of such meeting. If the Board so fixes a date, such date shall also be the record date for determining the stockholders entitled to vote at such meeting unless the Board determines, at the time it fixes such record date, that a later date on or before the date of the meeting shall be the date for making such determination. If no

record date is fixed by the Board, the record date for determining stockholders entitled to notice of or to vote at a meeting of stockholders shall be at the close of business on the day next preceding the day on which notice is given, or, if notice is waived, at the close of business on the day next preceding the day on which the meeting is held. A determination of stockholders of record entitled to notice of or to vote at a meeting of stockholders shall apply to any adjournment of the meeting; provided, however, that the Board may fix a new record date for determination of stockholders entitled to vote at the adjourned meeting, and in such case shall also fix as the record date for stockholders entitled to notice of such adjourned meeting the same or an earlier date as that fixed for determination of stockholders entitled to vote in accordance herewith at the adjourned meeting.

In order that the Corporation may determine the stockholders entitled to receive payment of any dividend or other distribution or allotment of any rights, or entitled to exercise any rights in respect of any change, conversion or exchange of stock or for the purpose of any other lawful action, the Board may fix a record date, which shall not be more than sixty (60) days prior to such action. If no such record date is fixed, the record date for determining stockholders for any such purpose shall be at the close of business on the day on which the Board adopts the resolution relating thereto.

4.6 Regulations. The issue and registration of shares of stock of the Corporation shall be governed by such other regulations as the Board may establish.

ARTICLE V

GENERAL PROVISIONS

5.1 Fiscal Year. Except as from time to time otherwise designated by the Board, the fiscal year of the Corporation shall begin on the first day of January of each year and end on the last day of December in each year.

5.2 Corporate Seal. The corporate seal shall be in such form as shall be approved by the Board.

5.3 Waiver of Notice. Whenever notice is required to be given by law, by the Certificate of Incorporation or by these Bylaws, a written waiver signed by the person entitled to notice, or a waiver by electronic transmission by the person entitled to notice, whether before, at or after the time of the event for which notice is to be given, shall be deemed equivalent to notice required to be given to such person. Neither the business nor the purpose of any meeting need be specified in any such waiver. Attendance of a person at a meeting shall constitute a waiver of notice of such meeting, except when the person attends a meeting for the express purpose of objecting at the beginning of the meeting, to the transaction of any business because the meeting is not lawfully called or convened.

5.4 Voting of Securities. Except as the Board may otherwise designate, the Chief Executive Officer, the President, the Chief Financial Officer or the Treasurer may waive notice, vote, consent, or appoint any person or persons to waive notice, vote or consent, on behalf of the Corporation, and act as, or appoint any person or persons to act as, proxy or attorney-in-fact for

this Corporation (with or without power of substitution), with respect to the securities of any other entity which may be held by this Corporation.

5.5 Evidence of Authority. A certificate by the Secretary, or an Assistant Secretary, or a temporary Secretary, as to any action taken by the stockholders, directors, a committee or any officer or representative of the Corporation shall as to all persons who rely on the certificate in good faith be conclusive evidence of such action.

5.6 Certificate of Incorporation. All references in these Bylaws to the Certificate of Incorporation shall be deemed to refer to the Certificate of Incorporation of the Corporation, as amended and/or restated and in effect from time to time.

5.7 Severability. Any determination that any provision of these Bylaws is for any reason inapplicable, illegal or ineffective shall not affect or invalidate any other provision of these Bylaws.

5.8 Pronouns. All pronouns used in these Bylaws shall be deemed to refer to the masculine, feminine or neuter, singular or plural, as the identity of the person or persons may require.

5.9 Manner of Notice. Without limiting the manner by which notice otherwise may be given effectively to stockholders, any notice to stockholders given by the Corporation under any provision of the DGCL, the Certificate of Incorporation or these Bylaws may be given in writing directed to the stockholder's mailing address (or by electronic transmission directed to the stockholder's electronic mail address, as applicable) as it appears on the records of the Corporation. Notice shall be given (i) if mailed, when deposited in the United States mail, (ii) if delivered by courier service, the earlier of when the notice is received or left at the stockholder's address, or (iii) if given by electronic mail, when directed to such stockholder's electronic mail address (unless the stockholder has notified the Corporation in writing or by electronic transmission of an objection to receiving notice by electronic mail or such notice is prohibited by the DGCL to be given by electronic transmission). A notice by electronic mail must include a prominent legend that the communication is an important notice regarding the Corporation. A notice by electronic mail shall be deemed to include any files attached thereto and any information hyperlinked to a website if such electronic mail includes the contact information of an officer or agent of the Corporation who is available to assist with accessing such files or information. Any notice to stockholders under any provision of the DGCL, the Certificate of Incorporation or these Bylaws provided by electronic transmission (other than any such notice given by electronic mail) may only be given in a form consented to by such stockholder, and any such notice by electronic transmission shall be deemed to be given as provided by the DGCL.

5.10 Electronic Transmission. For purposes of these Bylaws, "electronic transmission" means any form of communication, not directly involving the physical transmission of paper, including the use of, or participation in, one or more electronic networks or databases (including one or more distributed electronic networks or databases), that creates a record that may be retained, retrieved, and reviewed by a recipient thereof, and that may be directly reproduced in paper form by such a recipient through an automated process.

5.11 Federal Forum Selection. Unless the Corporation consents in writing to the selection of an alternative forum, the federal district courts of the United States shall be the exclusive forum for the resolution of any complaint asserting a cause of action arising under the Securities Act of 1933, as amended. To the fullest extent permitted by law, any person or entity purchasing or otherwise acquiring or holding any interest in shares of capital stock of the Corporation shall be deemed to have notice of and consented to the provisions of this Section 5.11.

ARTICLE VI

AMENDMENTS

These Bylaws may be altered, amended or repealed, in whole or in part, or new Bylaws may be adopted by the Board or by the stockholders as expressly provided in the Certificate of Incorporation.

ARTICLE VII

INDEMNIFICATION AND ADVANCEMENT

7.1 Power to Indemnify in Actions, Suits or Proceedings other than Those by or in the Right of the Corporation. Subject to Section 7.3, the Corporation shall indemnify any person who was or is a party or is threatened to be made a party to any threatened, pending or completed action, suit or proceeding, whether civil, criminal, administrative or investigative (other than an action by or in the right of the Corporation) by reason of the fact that such person is or was a director or officer of the Corporation, or, while a director or officer of the Corporation, is or was serving at the request of the Corporation as a director, officer, employee or agent of another Corporation, partnership, joint venture, trust, employee benefit plan or other enterprise, against expenses (including attorneys' fees), judgments, fines and amounts paid in settlement actually and reasonably incurred by such person in connection with such action, suit or proceeding if such person acted in good faith and in a manner such person reasonably believed to be in or not opposed to the best interests of the Corporation, and, with respect to any criminal action or proceeding, had no reasonable cause to believe such person's conduct was unlawful. The termination of any action, suit or proceeding by judgment, order, settlement, conviction, or upon a plea of nolo contendere or its equivalent, shall not, of itself, create a presumption that the person did not act in good faith and in a manner which such person reasonably believed to be in or not opposed to the best interests of the Corporation, and, with respect to any criminal action or proceeding, had reasonable cause to believe that such person's conduct was unlawful.

7.2 Power to Indemnify in Actions, Suits or Proceedings by or in the Right of the Corporation. Subject to Section 7.3, the Corporation shall indemnify any person who was or is a party or is threatened to be made a party to any threatened, pending or completed action or suit by or in the right of the Corporation to procure a judgment in its favor by reason of the fact that such person is or was a director or officer of the Corporation, or, while a director or officer of the Corporation, is or was serving at the request of the Corporation as a director, officer, employee or agent of another Corporation, partnership, joint venture, trust, employee benefit plan or other enterprise against expenses (including attorneys' fees) actually and reasonably incurred by such person in connection with the defense or settlement of such action or suit if such person acted in

good faith and in a manner such person reasonably believed to be in or not opposed to the best interests of the Corporation; except that no indemnification shall be made in respect of any claim, issue or matter as to which such person shall have been adjudged to be liable to the Corporation unless and only to the extent that the Court of Chancery or the court in which such action or suit was brought shall determine upon application that, despite the adjudication of liability but in view of all the circumstances of the case, such person is fairly and reasonably entitled to indemnity for such expenses which the Court of Chancery or such other court shall deem proper.

7.3 Authorization of Indemnification. Any indemnification under this Article VII (unless ordered by a court) shall be made by the Corporation only as authorized in the specific case upon a determination that indemnification of the director or officer is proper in the circumstances because such person has met the applicable standard of conduct set forth in Section 7.1 or Section 7.2, as the case may be. Such determination shall be made, with respect to a person who is a director or officer at the time of such determination, (i) by a majority vote of the directors who are not parties to such action, suit or proceeding, even though less than a quorum, or (ii) by a committee of such directors designated by a majority vote of such directors, even though less than a quorum, or (iii) if there are no such directors, or if such directors so direct, by independent legal counsel in a written opinion or (iv) by the stockholders. Such determination shall be made, with respect to former directors and officers, by any person or persons having the authority to act on the matter on behalf of the Corporation. To the extent, however, that a present or former director or officer of the Corporation has been successful on the merits or otherwise in defense of any action, suit or proceeding set forth in Section 7.1 or Section 7.2 or in defense of any claim, issue or matter therein, such person shall be indemnified against expenses (including attorneys' fees) actually and reasonably incurred by such person in connection therewith, without the necessity of authorization in the specific case.

7.4 Good Faith Defined. For purposes of any determination under Section 7.3, a person shall be deemed to have acted in good faith and in a manner such person reasonably believed to be in or not opposed to the best interests of the Corporation, or, with respect to any criminal action or proceeding, to have had no reasonable cause to believe such person's conduct was unlawful, if such person's action is based on good faith reliance on the records or books of account of the Corporation or another enterprise, or on information supplied to such person by the officers of the Corporation or another enterprise in the course of their duties, or on the advice of legal counsel for the Corporation or another enterprise or on information or records given or reports made to the Corporation or another enterprise by an independent certified public accountant or by an appraiser or other expert selected with reasonable care by the Corporation or another enterprise. The term "another enterprise" as used in this Section 7.4 shall mean any other corporation or any partnership, joint venture, trust, employee benefit plan or other enterprise of which such person is or was serving at the request of the Corporation as a director, officer, employee or agent. The provisions of this Section 7.4 shall not be deemed to be exclusive or to limit in any way the circumstances in which a person may be deemed to have met the applicable standard of conduct set forth in Section 7.1 or 7.2, as the case may be.

7.5 Right of Claimant to Bring Suit. Notwithstanding any contrary determination in the specific case under Section 7.3, and notwithstanding the absence of any determination thereunder, if a claim under Sections 7.1 or 7.2 of the Article VII is not paid in full by the Corporation within (i) ninety (90) days after a written claim for indemnification has been received by the Corporation,

or (ii) thirty (30) days after a written claim for an advancement of expenses has been received by the Corporation, the claimant may at any time thereafter (but not before) bring suit against the Corporation in the Court of Chancery in the State of Delaware to recover the unpaid amount of the claim, together with interest thereon, or to obtain advancement of expenses, as applicable. It shall be a defense to any such action brought to enforce a right to indemnification (but not in an action brought to enforce a right to an advancement of expenses) that the claimant has not met the standards of conduct which make it permissible under the DGCL (or other applicable law) for the Corporation to indemnify the claimant for the amount claimed, but the burden of proving such defense shall be on the Corporation. Neither a contrary determination in the specific case under Section 7.3 nor the absence of any determination thereunder shall be a defense to such application or create a presumption that the claimant has not met any applicable standard of conduct. If successful, in whole or in part, the claimant shall also be entitled to be paid the expense of prosecuting such claim, including reasonable attorneys' fees incurred in connection therewith, to the fullest extent permitted by applicable law.

7.6 Expenses Payable in Advance. Expenses, including without limitation attorneys' fees, incurred by a current or former director or officer in defending any civil, criminal, administrative or investigative action, suit or proceeding shall be paid by the Corporation in advance of the final disposition of such action, suit or proceeding upon receipt of an undertaking by or on behalf of such current or former director or officer to repay such amount if it shall ultimately be determined that such person is not entitled to be indemnified by the Corporation as authorized in this Article VII.

7.7 Nonexclusivity of Indemnification and Advancement of Expenses. The rights to indemnification and advancement of expenses provided by or granted pursuant to this Article VII shall not be deemed exclusive of any other rights to which those seeking indemnification or advancement of expenses may be entitled under the Certificate of Incorporation, any agreement, vote of stockholders or disinterested directors or otherwise, both as to action in such person's official capacity and as to action in another capacity while holding such office, it being the policy of the Corporation that, subject to Section 7.11, indemnification of the persons specified in Sections 7.1 and 7.2 shall be made to the fullest extent permitted by law. The provisions of this Article VII shall not be deemed to preclude the indemnification of any person who is not specified in Section 7.1 or 7.2 but whom the Corporation has the power or obligation to indemnify under the provisions of the DGCL, or otherwise.

7.8 Insurance. The Corporation may purchase and maintain insurance on behalf of any person who is or was a director, officer, employee or agent of the Corporation, or is or was serving at the request of the Corporation as a director, officer, employee or agent of another corporation, partnership, joint venture, trust, employee benefit plan or other enterprise against any liability asserted against such person and incurred by such person in any such capacity, or arising out of such person's status as such, whether or not the Corporation would have the power or the obligation to indemnify such person against such liability under the provisions of this Article VII.

7.9 Certain Definitions. For purposes of this Article VII, references to "the Corporation" shall include, in addition to the resulting corporation, any constituent corporation (including any constituent of a constituent) absorbed in a consolidation or merger which, if its separate existence had continued, would have had power and authority to indemnify its directors,

officers, employees or agents so that any person who is or was a director, officer, employee or agent of such constituent corporation, or is or was serving at the request of such constituent corporation as a director, officer, employee or agent of another corporation, partnership, joint venture, trust, employee benefit plan or other enterprise, shall stand in the same position under the provisions of this Article VII with respect to the resulting or surviving corporation as such person would have with respect to such constituent corporation if its separate existence had continued. For purposes of this Article VII, references to "fines" shall include any excise taxes assessed on a person with respect of any employee benefit plan; and references to "serving at the request of the Corporation" shall include any service as a director, officer, employee or agent of the Corporation which imposes duties on, or involves services by, such director, officer, employee or agent with respect to an employee benefit plan, its participants or beneficiaries; and a person who acted in good faith and in a manner such person reasonably believed to be in the interest of the participants and beneficiaries of an employee benefit plan shall be deemed to have acted in a manner "not opposed to the best interests of the Corporation" as referred to in this Article VII.

7.10 Survival of Indemnification and Advancement of Expenses. The indemnification and advancement of expenses provided by, or granted pursuant to, this Article VII shall, unless otherwise provided when authorized or ratified, continue as to a person who has ceased to be a director or officer and shall inure to the benefit of the heirs, executors and administrators of such a person.

7.11 Limitation on Indemnification. Notwithstanding anything contained in this Article VII to the contrary, except for proceedings to enforce rights to indemnification (which shall be governed by Section 7.5), the Corporation shall not be obligated to indemnify any director, officer, employee or agent in connection with an action, suit proceeding (or part thereof) initiated by such person unless such action, suit or proceeding (or part thereof) was authorized by the Board.

7.12 Contract Rights. The obligations of the Corporation under this Article VII to indemnify, and advance expenses to, a person who is or was a director or officer of the Corporation shall be considered a contract between the Corporation and such person, and no modification or repeal of any provision of this Article VII shall affect, to the detriment of such person, such obligations of the Corporation in connection with a claim based on any act or failure to act occurring before such modification or repeal.

CERTIFICATION OF CHIEF EXECUTIVE OFFICER AND CHIEF FINANCIAL OFFICER
PURSUANT TO 18 U.S.C. SECTION 1350,
AS ADOPTED PURSUANT TO
SECTION 906 OF THE SARBANES-OXLEY ACT OF 2002

I, Michael Burkland, certify, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that the Quarterly Report of Five9, Inc. (the "Company") on Form 10-Q for the fiscal quarter ended September 30, 2023 fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934 and that information contained in such Quarterly Report on Form 10-Q fairly presents in all material respects the financial condition and results of operations of the Company.

Date: November 2, 2023

By: _____
/s/ Michael Burkland
Michael Burkland
Chief Executive Officer

I, Barry Zwarenstein, certify, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that the Quarterly Report of Five9, Inc. (the "Company") on Form 10-Q for the fiscal quarter ended September 30, 2023 fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934 and that information contained in such Quarterly Report on Form 10-Q fairly presents in all material respects the financial condition and results of operations of the Company.

Date: November 2, 2023

By: _____
/s/ Barry Zwarenstein
Barry Zwarenstein
Chief Financial Officer

This certification accompanies the Form 10-Q to which it relates, is not deemed filed with the Securities and Exchange Commission and is not to be incorporated by reference into any filing of Five9, Inc. under the Securities Act of 1933, as amended, or the Securities Exchange Act of 1934, as amended (whether made before or after the date of the Form 10-Q), irrespective of any general incorporation language contained in such filing.