

STAT5B mutations in myeloid neoplasms differ by disease subtypes but characterize a subset of chronic myeloid neoplasms with eosinophilia and/or basophilia

C. Cameron Yin,¹ Wayne Tam,² Serena M. Walker,³ Amandeep Kaur,⁴ Madhu M. Ouseph,⁵ Wei Xie,⁶ Olga K. Weinberg,⁷ Peng Li,⁸ Zhuang Zuo,¹ Mark J. Routbort,¹ Simon Chen,³ L. Jeffrey Medeiros,¹ Tracy I. George,⁸ Attilio Orazi,⁹ Daniel A. Arber,⁴ Adam Bagg,³ Robert P. Hasserjian¹⁰ and Sa A. Wang¹

¹Department of Hematopathology, University of Texas MD Anderson Cancer Center, Houston, TX; ²Division of Hematopathology, Department of Pathology and Laboratory Medicine, Donald and Barbara Zucker School of Medicine, Hofstra/Northwell, Greenvale, NY; ³Department of Pathology and Laboratory Medicine, University of Pennsylvania, Philadelphia, PA; ⁴Department of Pathology, University of Chicago, Chicago, IL; ⁵Department of Pathology and Laboratory Medicine, Weill Cornell Medical Center, New York, NY; ⁶Department of Pathology & Laboratory Medicine, Oregon Health & Science University, Portland, OR; ⁷Department of Pathology, University of Texas Southwestern Medical Center, Dallas, TX; ⁸Department of Pathology, University of Utah, Salt Lake City, UT; ⁹Department of Pathology, Texas Tech University, El Paso, TX and ¹⁰Department of Pathology, Massachusetts General Hospital, Boston, MA, USA

Correspondence: S.A. Wang
Swang5@mdanderson.org

C.C. Yin
cyin@mdanderson.org

Received: September 17, 2023.

Accepted: November 9, 2023.

Early view: November 16, 2023.

<https://doi.org/10.3324/haematol.2023.284311>

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Supplemental table 1

ID	STAT5B mutation	VAF (%)
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MDS

1	c.1924A>C p.N642H	13.96
2	c.1909G>A p.E637K	1.51
3	c.1924A>C p.N642H	14.8
4	c.2018G>A p.R673Q	31.55
5	c.1924A>C p.N642H	47.5
6	c.1924A>C p.N642H	20.78
7	c.1924A>C p.N642H	38.31
8	c.1924A>C p.N642H	58.19
9	c.1924A>C p.N642H	43.82
10	c.1924A>C p.N642H	1.76
11	c.1924A>C p.N642H	2.03
12	c.1924A>C p.N642H	51.2
13	c.1924A>C p.N642H	30.2
14	c.1924A>C p.N642H	29.3
15	c.1924A>C p.N642H	22
16	c.1924A>C p.N642H	9.5
17	c.1903T>A p.S635T	2.8
18	c.1924A>C p.N642H	1.6
19	c.2117A>T p.Q706L	9
20	c.1882A>T p.T628S	24.6
21	c.1924A>C p.N642H	51
22	c.2110A>C p.I704L	8
23	c.1882A>T p.T628S	49

AML

1	c.1924A>C p.N642H	4.43
2	c.1924A>C p.N642H	1.88
3	c.1972G>A p.D658N	46.42
4	c.1924A>C p.N642H	31.49
5	c.1924A>C p.N642H	4.55
6	c.1924A>C p.N642H	6.99
7	c.1924A>C p.N642H	3.79
8	c.1924A>C p.N642H	45.2
9	c.1924A>C p.N642H	16
10	c.1924A>C p.N642H	32.3
11	c.1924A>C p.N642H	5.1
12	c.1883C>G p.T628S	1.1
13	c.1924A>C p.N642H	11

14	c.2135T>A, p.V712E	4.9
15	c.1924A>C p.N642H	5.5
16	c.1924A>C p.N642H	42.5
17	c.1924A>C p.N642H	10
18	c.1924A>C p.N642H	7
19	c.1924A>C p.N642H	51
20	c.1924A>C p.N642H	5
21	c.863A>T p.Q288L	53

MPN

1	c.1924A>C p.N642H	4.46
2	c.1924A>C p.N642H	4.03
3	c.1924A>C p.N642H	2.65
4	c.1994A>T p.Y665F	31.55
5	c.1924A>C p.N642H	3.41
6	c.1924A>C p.N642H	33.03
7	c.1994A>T p.Y665F	1.41
8	c.1924A>C p.N642H	11
9	c.1924A>C p.N642H	50
10	c.1994A>T p.Y665F	7

MDS/MPN

1	c.1924A>C p.N642H	2.8
2	c.1994A>T p.Y665F	18.6
3	c.1924A>C p.N642H	41.95
4	c.1924A>C p.N642H	5.2
5	c.1924A>C p.N642H	47.95
6	c.1924A>C p.N642H	49.93
7	c.1924A>C p.N642H	28.3
8	c.1994A>T p.Y665F	15.6
9	c.1924A>C p.N642H	4.9
10	c.1924A>C p.N642H	4.2
11	c.1924A>C, p.N642H	5.5
12	c.1924A>C p.N642H	43
13	c.1909G>A p.E637K	49.2
14	c.1924A>C p.N642H	1.46
15	c.1924A>C p.N642H	57.2

CEL-NOS

1	c.1924A>C p.N642H	78.5
2	c.1924A>C p.N642H	45.39

3	c.1924A>C p.N642H	37.1
4	c.1924A>C p.N642H	61.26
5	c.1924A>C p.N642H	47.95
6	c.1924A>C p.N642H	35.9
7	c.1994A>T p.Y665F	38.8
	c.1282G>A p.D428N	29.6
8	c.1924A>C p.N642H	7
9	c.1924A>C p.N642H	46
10	c.1924A>C p.N642H	23
11	c.1924A>C p.N642H	43
12	c.1924A>C p.N642H	49

SM

1	c.1924A>C p.N642H	43.7
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Supplemental table 2

STAT5B mutation	MDS (23)	AML	MPN	MDS/MPN	CEL-NOS	SM	in COSMIC	Somatic	Activating	Previously reported cases
c.1924A>C p.N642H	16 (70%)	17	7	12	11	1	Yes	Yes	Yes	Most common hot spots
c.863A>T p.Q288L	0	1	0	0	0	0	Yes	Unknown	Unknown	bile duct adenocarcinoma
c.1282G>A p.D428N	0	0	0	0	1	0	No	Unknown	Unknown	None
c.1882A>T p.T628S	2	1	0	0	0	0	Yes	Yes	Unknown	B-ALL, MDS-RS, T-ALL, T-LGL, T-PLL
c.1903T>A p.S635T	1	0	0	0	0	0	No	Unknown	Unknown	None
c.1909G>A p.E637K	1	0	0	1	0	0	No	Unknown	Unknown	None
c.1972G>A p.D658N	0	1	0	0	0	0	Yes	Yes	Unknown	breast carcinoma
c.1994A>T p.Y665F	0	0	3	2	1	0	Yes	Yes	Yes	T-ALL, HSTCL, MF/SS, T-LGL, T-PLL
c.2018G>A p.R673Q	1	0	0	0	0	0	No	Unknown	Unknown	None
c.2110A>C p.I704L	1	0	0	0	0	0	Yes	Yes	Yes	T-LGL
c.2117A>T p.Q706L	1	0	0	0	0	0	Yes	Yes	Unknown	GI adenocarcinoma, T-LGL, T-PLL
c.2135T>A, p.V712E	0	1	0	0	0	0	Yes	Yes	Unknown	MF/SS, MDS-RS, T-ALL, T-LGL,