

Supplementary data

Internal dynamics in organometallic molecules: Rotational spectrum of $(\text{CH}_3)_3\text{GeCl}$

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TABLE I: Observed frequencies ν_{obs} of the main isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{35}\text{Cl}$, with calculated frequencies ν_{calc} from the least-square fit (XIAM), and deviations $\delta\nu=\nu_{obs}-\nu_{calc}$. The $k=1$ ($1\ \sigma$) standard uncertainties σ_{obs} describe the accuracy of the line measurements from the experiment and are also listed.

J'	J	$2F'$	$2F$	K	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
1	0	5	3	0	A1	3.9813785	2	3.9813751	3.4
		1	3	0	A1	3.9893953	2	3.9893892	6.1
		5	3	0	I1	3.9810600	2	3.9810555	4.4
		3	3	0	I1	3.9710433	2	3.9710387	4.6
		1	3	0	I1	3.9890748	2	3.9890690	5.9
		5	3	0	I2	3.9811956	2	3.9811930	2.6
		3	3	0	I2	3.9711811	2	3.9711762	4.9
		1	3	0	I2	3.9892125	2	3.9892065	6.0
		5	3	0	I3	3.9807868	2	3.9807843	2.6
		3	3	0	I3	3.9707754	2	3.9707697	5.8
		1	3	0	I3	3.9888017	3	3.9887959	5.8
		5	3	0	I4	3.9809711	2	3.9809663	4.8
		3	3	0	I4	3.9709559	2	3.9709510	4.9
		1	3	0	I4	3.9889847	2	3.9889785	6.1
2	1	7	5	0	A1	7.9595942	4	7.9595939	0.3
		5	3	0	A1	7.9595942	4	7.9595939	0.3
		5	5	0	A1	7.9495773	4	7.9495764	0.9
		3	1	0	A1	7.9487237	4	7.9487177	6.0
		1	1	0	A1	7.9587307	4	7.9587353	-4.6
		5	5	0	E2	7.9487524	5	7.9487516	0.8
		3	1	0	E2	7.9478987	5	7.9478929	5.8
		7	5	0	I1	7.9589549	4	7.9589552	-0.3
		5	3	0	I1	7.9589549	4	7.9589552	-0.3

TABLE I: continue: Observed frequencies ν_{obs} of the main isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	K	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
	5	5	0	I1		7.9489389	4	7.9489384	1.4
	3	1	0	I1		7.9480867	4	7.9480798	6.9
	1	1	0	I1		7.9580943	4	7.9580966	-2.3
	7	5	0	I2		7.9592299	4	7.9592301	-0.2
	5	3	0	I2		7.9592299	4	7.9592301	-0.2
	5	5	0	I2		7.9492143	4	7.9492132	1.2
	3	1	0	I2		7.9483618	4	7.9483547	7.1
	1	1	0	I2		7.9583698	4	7.9583715	-1.7
	7	5	0	I3		7.9584133	4	7.9584139	-0.6
	5	3	0	I3		7.9584133	4	7.9584139	-0.6
	5	5	0	I3		7.9484007	4	7.9483993	1.4
	3	1	0	I3		7.9475480	4	7.9475409	7.1
	1	1	0	I3		7.9575526	4	7.9575555	-2.9
	7	5	0	I4		7.9587780	4	7.9587774	0.6
	5	3	0	I4		7.9587780	4	7.9587774	0.6
	5	5	0	I4		7.9487643	4	7.9487621	2.2
	3	1	0	I4		7.9479105	4	7.9479037	6.8
	1	1	0	I4		7.9579172	4	7.9579190	-1.8
3	2	7	5	0	A1	11.9385594	4	11.9385601	-0.7
	9	7	0	A1		11.9385594	4	11.9385601	-0.7
	3	1	0	A1		11.9360793	4	11.9360795	-0.2
	5	3	0	A1		11.9360793	4	11.9360795	-0.2
	5	5	0	A1		11.9432367	4	11.9432350	1.7
	7	7	0	A1		11.9285415	4	11.9285425	-1.0
	7	5	0	E2		11.9373205	5	11.9373234	-2.9
	9	7	0	E2		11.9373205	5	11.9373234	-2.9

TABLE I: continue: Observed frequencies ν_{obs} of the main isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	K	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
	5	5	0	E2		11.9419979	5	11.9419983	-0.4
	7	5	0	I1		11.9376011	4	11.9376026	-1.5
	9	7	0	I1		11.9376011	4	11.9376026	-1.5
	3	1	0	I1		11.9351170	4	11.9351223	-5.3
	5	3	0	I1		11.9351170	4	11.9351223	-5.3
	5	5	0	I1		11.9422802	4	11.9422772	3.0
	7	7	0	I1		11.9275847	4	11.9275858	-1.1
	7	5	0	I2		11.9380148	4	11.9380146	0.2
	9	7	0	I2		11.9380148	4	11.9380146	0.2
	3	1	0	I2		11.9355285	4	11.9355342	-5.7
	5	3	0	I2		11.9355285	4	11.9355342	-5.7
	5	5	0	I2		11.9426924	4	11.9426891	3.3
	7	7	0	I2		11.9279978	4	11.9279978	0.0
	7	5	0	I3		11.9367902	4	11.9367920	-1.8
	9	7	0	I3		11.9367902	4	11.9367920	-1.8
	3	1	0	I3		11.9343054	4	11.9343122	-6.8
	5	3	0	I3		11.9343054	4	11.9343122	-6.8
	5	5	0	I3		11.9414680	4	11.9414655	2.5
	7	7	0	I3		11.9267763	4	11.9267774	-1.1
	7	5	0	I4		11.9373361	4	11.9373364	-0.3
	9	7	0	I4		11.9373361	4	11.9373364	-0.3
	3	1	0	I4		11.9348513	4	11.9348564	-5.1
	5	3	0	I4		11.9348513	4	11.9348564	-5.1
	5	5	0	I4		11.9420139	4	11.9420102	3.7
	7	7	0	I4		11.9273207	4	11.9273211	-0.4
4	3	11	9	0	A1	15.9177101	4	15.9177105	-0.4

TABLE I: continue: Observed frequencies ν_{obs} of the main isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	K	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
9	7	0	A1			15.9177101	4	15.9177105	-0.4
7	7	0	A1			15.9212246	4	15.9212232	1.4
7	5	0	A1			15.9165468	4	15.9165483	-1.5
5	3	0	A1			15.9165468	4	15.9165483	-1.5
9	9	0	A1			15.9076923	4	15.9076929	-0.6
5	5	0	A1			15.9265589	4	15.9265659	-0.7
11	9	0	E2			15.9160579	5	15.9160626	-4.7
9	7	0	E2			15.9160579	5	15.9160626	-4.7
11	9	0	I1			15.9164331	4	15.9164351	-2.0
9	7	0	I1			15.9164331	4	15.9164351	-2.0
7	7	0	I1			15.9199486	4	15.9199475	1.1
9	9	0	I1			15.9064164	4	15.9064182	-1.8
5	5	0	I1			15.9252839	4	15.9252898	-5.9
7	5	0	I1			15.9152705	4	15.9152729	-2.5
5	3	0	I1			15.9152705	4	15.9152730	-2.5
11	9	0	I2			15.9169830	4	15.9169838	-0.8
9	7	0	I2			15.9169830	4	15.9169838	-0.8
7	7	0	I2			15.9204982	4	15.9204962	2.0
7	5	0	I2			15.9158196	4	15.9158216	-2.0
5	3	0	I2			15.9158196	4	15.9158216	-2.0
9	9	0	I2			15.9069659	4	15.9069669	-1.0
5	5	0	I2			15.9258318	4	15.9258385	-6.7
11	9	0	I3			15.9153548	4	15.9153565	-1.7
9	7	0	I3			15.9153548	4	15.9153565	-1.7
9	9	0	I3			15.9053395	4	15.9053419	-2.4
5	5	0	I3			15.9242023	4	15.9242092	-6.9

TABLE I: continue: Observed frequencies ν_{obs} of the main isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	K	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
	7	5	0	I3		15.9141909	4	15.9141947	-3.8
	5	3	0	I3		15.9141909	4	15.9141947	-3.8
	11	9	0	I4		15.9160811	4	15.9160808	0.3
	9	7	0	I4		15.9160811	4	15.9160808	0.3
	7	5	0	I4		15.9149164	4	15.9149189	-2.5
	5	3	0	I4		15.9149164	4	15.9149189	-2.5
	9	9	0	I4		15.9060649	4	15.9060655	-0.6
	5	5	0	I4		15.9249283	4	15.9249342	-5.9
5	4	9	7	0	A1	19.8962207	4	19.8962220	-1.3
	7	5	0	A1		19.8962207	4	19.8962220	-1.3
	11	9	0	A1		19.8969085	4	19.8969092	-0.7
	13	11	0	A1		19.8969085	4	19.8969092	-0.7
	9	9	0	A1		19.8997354	4	19.8997346	0.8
	11	11	0	A1		19.8868914	4	19.8868916	-0.2
	9	7	0	E2		19.8941586	5	19.8941635	-4.9
	7	5	0	E2		19.8941586	5	19.8941635	-4.9
	9	7	0	I1		19.8946284	4	19.8946296	-1.2
	7	5	0	I1		19.8946284	4	19.8946296	-1.2
	11	9	0	I1		19.8953148	4	19.8953167	-1.9
	13	11	0	I1		19.8953148	4	19.8953167	-1.9
	9	9	0	I1		19.8981464	4	19.8981420	4.4
	9	7	0	I2		19.8953148	4	19.8953145	0.3
	7	5	0	I2		19.8953148	4	19.8953145	0.3
	11	9	0	I2		19.8960037	4	19.8960016	2.1
	13	11	0	I2		19.8960037	4	19.8960016	2.1
	9	9	0	I2		19.8988292	4	19.8988269	2.3

TABLE I: continue: Observed frequencies ν_{obs} of the main isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	K	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
	11	11	0	I2		19.8859850	4	19.8859848	0.2
	9	7	0	I4		19.8941874	4	19.8941879	-0.5
	7	5	0	I4		19.8941874	4	19.8941879	-0.5
	11	9	0	I4		19.8948751	4	19.8948750	0.1
	13	11	0	I4		19.8948751	4	19.8948750	0.1
	9	9	0	I4		19.8977038	4	19.8976998	4.0
6	5	15	13	0	A1	23.8761081	4	23.8761054	2.7
	13	11	0	A1		23.8761081	4	23.8761054	2.7
	11	11	0	A1		23.8784765	4	23.8784732	3.3
	13	13	0	A1		23.8660931	4	23.8660878	5.3
	15	13	0	E2		23.8736407	5	23.8736374	3.2
	13	11	0	E2		23.8736407	5	23.8736374	3.2
	15	13	0	I1		23.8741989	4	23.8741971	1.8
	13	11	0	I1		23.8741989	4	23.8741971	1.8
	11	9	0	I1		23.8737382	4	23.8737395	-1.3
	9	7	0	I1		23.8737382	4	23.8737395	-1.3
	15	13	0	I2		23.8750201	4	23.8750176	2.5
	13	11	0	I2		23.8750201	4	23.8750176	2.5
	11	9	0	I2		23.8745605	4	23.8745600	0.6
	9	7	0	I2		23.8745605	4	23.8745600	0.6
	15	13	0	I3		23.8725909	4	23.8725889	2.0
	13	11	0	I3		23.8725909	4	23.8725889	2.0
	15	13	0	I4		23.8736698	4	23.8736686	1.2
	13	11	0	I4		23.8736698	4	23.8736686	1.2
	11	11	0	I4		23.8760361	4	23.8760358	0.3
	11	9	0	I4		23.8732125	4	23.8732110	1.5

TABLE I: continue: Observed frequencies ν_{obs} of the main isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	K	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
		9	7	0	I4	23.8732125	4	23.8732110	1.4
2	1	7	5	1	A1	7.9611650	4	7.9611682	-3.2
		5	3	1	A1	7.9511533	4	7.9511506	2.7
		7	5	1	I1	7.9606430	4	7.9606452	-2.2
		5	3	1	I1	7.9506308	4	7.9506277	3.1
		7	5	1	I2	7.9609165	4	7.9609214	-4.8
		7	5	1	I4	7.9607022	4	7.9607030	-0.8
3	1	5	5	1	I1	11.9393759	4	11.9393623	13.6
		7	5	1	I2	11.9362819	4	11.9362758	6.2
		9	7	1	I2	11.9387897	4	11.9387802	9.5
4	1	11	9	1	A1	15.9179869	4	15.9179989	-12.1
		7	7	1	A1	15.9199718	4	15.9199829	-11.1
		7	5	1	A1	15.9164697	4	15.9164768	-7.1
		5	3	1	A1	15.9174733	4	15.9174785	-5.2
		5	5	1	A1	15.9249866	4	15.9249917	-5.2

TABLE II: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{72}\text{Ge}^{35}\text{Cl}$, with calculated frequencies ν_{calc} from the least-square fit (XIAM), and deviations $\delta\nu=\nu_{obs}-\nu_{calc}$. The $k=1$ (1σ) standard uncertainties σ_{obs} describe the accuracy of the line measurements from the experiment and are also listed.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
2	1	7	5	A1	7.9665128	4	7.9665121	0.7
		5	3	A1	7.9665128	4	7.9665121	0.7
		5	5	A1	7.9564966	4	7.9564969	-0.3
		3	1	A1	7.9556448	4	7.9556385	6.3
		7	5	I1	7.9658734	4	7.9658718	1.6
		5	3	I1	7.9658734	4	7.9658718	1.6
		5	5	I1	7.9558578	4	7.9558574	0.3
		3	1	I1	7.9550055	4	7.9549991	6.4
		7	5	I2	7.9661490	4	7.9661472	1.8
		5	3	I2	7.9661490	4	7.9661472	1.8
		5	5	I2	7.9561330	4	7.9561328	0.1
		3	1	I2	7.9552804	4	7.9552745	5.9
		7	5	I3	7.9653301	4	7.9653287	1.4
		5	3	I3	7.9653301	4	7.9653287	1.4
		7	5	I4	7.9656945	4	7.9656932	1.3
		5	3	I4	7.9656945	4	7.9656932	1.3
		3	1	I4	7.9548270	4	7.9548222	4.8
3	2	7	5	A1	11.9489381	4	11.9489377	0.3
		9	7	A1	11.9489381	4	11.9489377	0.3
		3	1	A1	11.9464505	4	11.9464578	-7.3
		5	3	A1	11.9464505	4	11.9464578	-7.3
		5	5	A1	11.9536154	4	11.9536115	3.9
		7	5	I1	11.9479779	4	11.9479780	-0.1

TABLE II: continue: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{72}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
9	7	I1			11.9479779	4	11.9479780	-0.1
3	1	I1			11.9454935	4	11.9454983	-4.8
5	3	I1			11.9454935	4	11.9454983	-4.8
5	5	I1			11.9526563	4	11.9526514	4.9
7	5	I2			11.9483919	4	11.9483908	1.1
9	7	I2			11.9483919	4	11.9483908	1.1
3	1	I2			11.9459065	4	11.9459111	-4.5
5	3	I2			11.9459065	4	11.9459111	-4.5
5	5	I2			11.9530695	4	11.9530642	5.3
7	7	I2			11.9383766	4	11.9383764	0.1
7	5	I3			11.9471644	4	11.9471648	-0.4
9	7	I3			11.9471644	4	11.9471648	-0.4
3	1	I3			11.9446871	4	11.9446856	1.5
5	3	I3			11.9446871	4	11.9446856	1.5
7	5	I4			11.9477126	4	11.9477106	2.0
9	7	I4			11.9477106	4	11.9477106	2.0
3	1	I4			11.9452270	4	11.9452312	-4.2
5	3	I4			11.9452270	4	11.9452312	-4.2
5	5	I4			11.9523894	4	11.9523833	6.1
7	7	I4			11.9376972	4	11.9376977	-0.5
4	3	11	9	A1	15.9315476	4	15.9315479	-0.3
9	7	A1			15.9315476	4	15.9315479	-0.3
7	7	A1			15.9350630	4	15.9350597	3.2
7	5	A1			15.9303827	4	15.9303860	-3.3
5	3	A1			15.9303827	4	15.9303860	-3.3
11	9	I1			15.9302700	4	15.9302695	0.5

TABLE II: continue: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{72}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
9	7	I1			15.9302700	4	15.9302695	0.6
7	7	I1			15.9337836	4	15.9337810	2.6
7	5	I1			15.9291056	4	15.9291076	-2.0
5	3	I1			15.9291056	4	15.9291076	-2.0
11	9	I2			15.9308193	4	15.9308193	0.0
9	7	I2			15.9308193	4	15.9308193	0.0
7	7	I2			15.9343340	4	15.9343308	3.2
7	5	I2			15.9296553	4	15.9296575	-2.1
5	3	I2			15.9296553	4	15.9296575	-2.1
9	9	I2			15.9208021	4	15.9208049	-2.8
11	9	I3			15.9291871	4	15.9291875	-0.4
9	7	I3			15.9291871	4	15.9291875	-0.4
7	5	I3			15.9280234	4	15.9280259	-2.6
5	3	I3			15.9280234	4	15.9280259	-2.6
11	9	I4			15.9299138	4	15.9299137	0.1
9	7	I4			15.9299138	4	15.9299137	0.1
7	5	I4			15.9287504	4	15.9287520	-1.6
5	3	I4			15.9287504	4	15.9287520	-1.6
5	4	9	7	A1	19.9135200	4	19.9135198	0.2
		7	5	A1	19.9135200	4	19.9135198	0.2
		11	9	A1	19.9142080	4	19.9142068	1.2
		13	11	A1	19.9142080	4	19.9142068	1.2
		9	9	A1	19.9170305	4	19.9170316	-1.0
		11	11	A1	19.9042002	4	19.9041917	8.6
		9	7	I1	19.9119218	4	19.9119236	-1.8
		7	5	I1	19.9119218	4	19.9119236	-1.8

TABLE II: continue: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{72}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
11	9	I1			19.9126088	4	19.9126106	-1.8
13	11	I1			19.9126088	4	19.9126106	-1.8
9	9	I1			19.9154368	4	19.9154351	1.7
9	7	I2			19.9126088	4	19.9126099	-1.1
7	5	I2			19.9126088	4	19.9126099	-1.1
11	9	I2			19.9132981	4	19.9132969	1.3
13	11	I2			19.9132981	4	19.9132969	1.3
9	9	I2			19.9161240	4	19.9161215	2.5
11	11	I2			19.9032802	4	19.9032825	-2.3
9	7	I3			19.9105720	4	19.9105749	-2.9
7	5	I3			19.9105720	4	19.9105749	-2.9
11	9	I3			19.9112618	4	19.9112617	0.0
13	11	I3			19.9112618	4	19.9112617	0.0
9	7	I4			19.9114806	4	19.9114800	0.6
7	5	I4			19.9114806	4	19.9114800	0.6
11	9	I4			19.9121670	4	19.9121669	0.1
13	11	I4			19.9121670	4	19.9121669	0.1
6	5	15	13	I1	23.8949517	4	23.8949510	0.7
		13	11	I1	23.8949517	4	23.8949510	0.7
		11	9	I1	23.8944953	4	23.8944934	1.9
		9	7	I1	23.8944953	4	23.8944934	1.9
		15	13	I2	23.8957733	4	23.8957732	0.2
		13	11	I2	23.8957733	4	23.8957732	0.2
		11	9	I2	23.8953122	4	23.8953156	-3.4
		9	7	I2	23.8953122	4	23.8953156	-3.4
		15	13	I3	23.8933413	4	23.8933376	3.7

TABLE II: continue: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{72}\text{Ge}^{35}\text{Cl}$.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
13	11	I3			23.8933413	4	23.8933376	3.7
15	13	I4			23.8944188	4	23.8944201	-1.3
13	11	I4			23.8944188	4	23.8944201	-1.3
11	9	I4			23.8939633	4	23.8939626	0.7
9	7	I4			23.8939633	4	23.8939627	0.6

TABLE III: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{37}\text{Cl}$, with calculated frequencies ν_{calc} from the least-square fit (XIAM), and deviations $\delta\nu=\nu_{obs}-\nu_{calc}$. The $k=1$ (1σ) standard uncertainties σ_{obs} describe the accuracy of the line measurements from the experiment and are also listed.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
1	0	1	3	A1	3.8852124	3	3.8852114	1.0
		5	3	I1	3.8785949	3	3.8785921	2.8
		1	3	I1	3.8849121	3	3.8849103	1.8
		5	3	I2	3.8787218	4	3.8787225	-0.7
		1	3	I2	3.8850421	3	3.8850407	1.4
		5	3	I3	3.8783435	3	3.8783419	1.6
		5	3	I4	3.8785134	5	3.8785122	1.1
		1	3	I4	3.8848309	3	3.8848296	1.3
2	1	7	5	A1	7.7552970	4	7.7552959	1.0
		5	3	A1	7.7552970	4	7.7552959	1.0
		7	5	I1	7.7546952	4	7.7546949	0.3
		5	3	I1	7.7546952	4	7.7546949	0.3
		7	5	I2	7.7549559	4	7.7549555	0.3
		5	3	I2	7.7549559	4	7.7549555	0.3
		7	5	I3	7.7541959	4	7.7541954	0.6
		5	3	I3	7.7541959	4	7.7541954	0.6
		7	5	I4	7.7545366	4	7.7545355	1.1
		5	3	I4	7.7545366	4	7.7545355	1.1
3	2	7	5	A1	11.6322852	4	11.6322860	-0.8
		9	7	A1	11.6322852	4	11.6322860	-0.8
		3	1	A1	11.6303272	4	11.6303303	-3.1
		5	3	A1	11.6303272	4	11.6303303	-3.1
		7	7	A1	11.6243912	4	11.6243877	3.5

TABLE III: continue: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{37}\text{Cl}$.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
7	5	I1			11.6313844	4	11.6313850	-0.6
9	7	I1			11.6313844	4	11.6313850	-0.6
3	1	I1			11.6294264	4	11.6294294	-3.0
5	3	I1			11.6294264	4	11.6294294	-3.0
5	5	I1			11.6350722	4	11.6350707	1.5
7	7	I1			11.6234901	4	11.6234873	2.8
7	5	I2			11.6317755	4	11.6317757	-0.2
9	7	I2			11.6317755	4	11.6317757	-0.2
3	1	I2			11.6298170	4	11.6298201	-3.0
5	3	I2			11.6298170	4	11.6298201	-3.0
5	5	I2			11.6354621	4	11.6354613	0.8
7	7	I2			11.6238806	4	11.6238779	2.7
7	5	I3			11.6306364	4	11.6306369	-0.5
9	7	I3			11.6306364	4	11.6306369	-0.5
3	1	I3			11.6286792	4	11.6286816	-2.4
5	3	I3			11.6286792	4	11.6286816	-2.4
5	5	I3			11.6343222	4	11.6343218	0.4
7	7	I3			11.6227424	4	11.6227406	1.8
7	5	I4			11.6311464	4	11.6311463	0.1
9	7	I4			11.6311464	4	11.6311463	0.1
3	1	I4			11.6291889	4	11.6291910	-2.0
5	3	I4			11.6291889	4	11.6291909	-2.0
5	5	I4			11.6348321	4	11.6348315	0.6
7	7	I4			11.6232527	4	11.6232496	3.1
4	3	11	9	A1	15.5094175	4	15.5094180	-0.5
9	7	A1			15.5094175	4	15.5094180	-0.5

TABLE III: continue: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{37}\text{Cl}$.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
7	7	A1			15.5121869	4	15.5121876	-0.7
7	5	A1			15.5085022	4	15.5085017	-0.5
5	3	A1			15.5085022	4	15.5085017	0.5
11	9	I1			15.5082179	4	15.5082177	0.2
9	7	I1			15.5082179	4	15.5082177	0.2
9	9	I1			15.5003236	4	15.5003200	3.6
11	9	I2			15.5087387	4	15.5087381	0.6
9	7	I2			15.5087387	4	15.5087381	0.6
7	7	I2			15.5115075	4	15.5115074	0.0
7	5	I2			15.5078234	4	15.5078218	1.5
5	3	I2			15.5078234	4	15.5078218	1.5
9	9	I2			15.5008423	4	15.5008403	2.0
11	9	I3			15.5072224	4	15.5072221	0.3
9	7	I3			15.5072224	4	15.5072221	0.3
7	5	I3			15.5063015	4	15.5063060	-4.4
5	3	I3			15.5063015	4	15.5063060	-4.4
11	9	I4			15.5079010	4	15.5079000	1.0
9	7	I4			15.5079010	4	15.5079000	1.0
7	5	I4			15.5069833	4	15.5069839	-0.6
5	3	I4			15.5069833	4	15.5069839	-0.6
9	9	I4			15.5000051	4	15.5000033	1.8
7	7	I4			15.5106709	4	15.5106690	1.9
5	4	9	7	A1	19.3860405	4	19.3860418	-1.3
7	5	A1			19.3860405	4	19.3860418	-1.3
11	9	A1			19.3865836	4	19.3865836	-0.8
13	11	A1			19.3865828	4	19.3865836	-0.8

TABLE III: continue: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{37}\text{Cl}$.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
	9	7	I1		19.3845422	4	19.3845430	-0.9
	7	5	I1		19.3845422	4	19.3845430	-0.9
	9	7	I2		19.3851912	4	19.3851927	-1.4
	7	5	I2		19.3851912	4	19.3851927	-1.4
	11	9	I2		19.3857342	4	19.3857344	-0.2
	13	11	I2		19.3857342	4	19.3857344	-0.2
	11	9	I3		19.3838431	4	19.3838432	-0.1
	13	11	I3		19.3838431	4	19.3838432	-0.1
	9	7	I4		19.3841468	4	19.3841469	-0.1
	7	5	I4		19.3841468	4	19.3841469	-0.1
	11	9	I4		19.3846895	4	19.3846886	0.9
	13	11	I4		19.3846895	4	19.3846886	0.9
6	5	11	9	A1	23.2633801	4	23.2633808	-0.7
	9	7	A1		23.2633801	4	23.2633808	-0.7
	13	11	A1		23.2637425	4	23.2637416	0.9
	15	13	A1		23.2637425	4	23.2637416	0.9
	13	11	I1		23.2619454	4	23.2619454	0.0
	15	13	I1		23.2619454	4	23.2619454	0.0
	11	9	I2		23.2623613	4	23.2623629	-1.7
	9	7	I2		23.2623613	4	23.2623629	-1.7
	13	11	I2		23.2627258	4	23.2627238	2.0
	15	13	I2		23.2627258	4	23.2627238	2.0
	11	9	I3		23.2600984	4	23.2600990	-0.6
	9	7	I3		23.2600984	4	23.2600990	-0.6
	13	11	I3		23.2604608	4	23.2604598	1.0
	15	13	I3		23.2604608	4	23.2604598	1.0

TABLE III: continue: Observed frequencies ν_{obs} of the isotopologue $(\text{CH}_3)_3^{74}\text{Ge}^{37}\text{Cl}$.

J'	J	$2F'$	$2F$	Sym	ν_{obs}/GHz	σ_{obs}/kHz	ν_{calc}/GHz	$\delta\nu/\text{kHz}$
	11	9	I4		23.2611109	4	23.2611104	0.5
	9	7	I4		23.2611109	4	23.2611104	0.5
	13	11	I4		23.2614715	4	23.2614712	0.3
	15	13	I4		23.2614715	4	23.2614712	0.3