

**Supplementary Information Table S1.** List of analysed *Dothistroma pini* isolates with their detailed descriptions

Region	Locality	DNA ID	Culture ID <sup>a</sup>	Host tree	Mating type	ITS haplotypes	GenBank No (ITS)	MLH	DAPC/ Structure cluster
1	Košice	D682	n.m.	<i>P. ponderosa</i>	MAT1	HAP.1	MT365510	MLH03	1
		D720	n.m.	<i>P. ponderosa</i>	MAT1	HAP.1	MT365469	MLH03	1
		D722	M0629, CMW51012	<i>P. ponderosa</i>	MAT1	HAP.1	MT365471	MLH03	1
		D721	M0630, CMW51013	<i>P. ponderosa</i>	MAT1	HAP.1	MT365470	MLH03	1
		D723	M0631, CMW51014	<i>P. ponderosa</i>	MAT1	HAP.1	MT365472	MLH03	1
	Sečovce	D431	M0392	<i>P. mugo</i>	MAT2	HAP.2	KX058162	MLH05	2
2	Banská Belá	D609	n.m.	<i>P. nigra</i>	MAT1	HAP.2	KY857572	MLH07	2
		D610	M0596	<i>P. nigra</i>	MAT1	HAP.2	KY857573	MLH07	2
		D624	n.m.	<i>P. nigra</i>	MAT1	HAP.2	KY857574	MLH07	2
	Kováčová	D708	n.m.	<i>P. mugo</i>	neg.r. <sup>b</sup>	HAP.2	MT365512	MLH04	2
	Ľubochňa	D494	n.m.	<i>P. sylvestris</i>	MAT2	HAP.1	KY857582	MLH12	1
	Zvolen	D516	n.m.	<i>P. jeffreyi</i>	MAT2	HAP.1	MT365509	MLH12	1
		D744	M0648	<i>P. jeffreyi</i>	MAT2	HAP.4	MT365486	MLH06	2
		D745	n.m.	<i>P. jeffreyi</i>	MAT2	HAP.1	MT365487	MLH02	1
		D746	n.m.	<i>P. jeffreyi</i>	MAT2	HAP.1	MT365488	MLH12	1
	3	Mlyňany Arboretum	D548	M0024	<i>P. ponderosa</i>	MAT2	HAP.1	MT365462	MLH15
D539			M0025	<i>P. ponderosa</i>	MAT2	HAP.2	MT365457	MLH01	2
D203			M0195, CMW47094	<i>P. jeffreyi</i>	MAT2	HAP.1	MF696153	MLH15	1
D324			M0308, CMW48230	<i>P. ponderosa</i>	MAT2	HAP.1	MT365431	MLH15	1
D368			M0347, CMW48231	<i>P. jeffreyi</i>	MAT2	HAP.1	MT365431	MLH15	1
D413			M397	<i>P. ponderosa</i>	MAT2	HAP.1	MT365433	MLH15	1
D436			M0407, CMW47095	<i>P. ponderosa</i>	MAT2	HAP.1	MT365434	MLH15	1
D437			M0408, CMW47096	<i>P. ponderosa</i>	MAT2	HAP.1	MT365435	MLH15	1
D438			M0410	<i>P. ponderosa</i>	MAT2	HAP.1	MT365436	MLH15	1
D440			M0411	<i>P. ponderosa</i>	MAT2	HAP.1	MT365437	MLH15	1

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		D441	M0412, CMW47097	<i>P. ponderosa</i>	MAT2	HAP.1	MT365438	MLH15	1
		D442	M0413, CMW47098	<i>P. ponderosa</i>	MAT2	HAP.1	MT365439	MLH15	1
		D443	M0414	<i>P. ponderosa</i>	MAT2	HAP.1	MT365440	MLH10	1
		D444	M0416, CMW47099	<i>P. ponderosa</i>	MAT2	HAP.1	MT365441	MLH15	1
		D447	M0419, CMW48721	<i>P. nigra</i>	MAT2	HAP.1	KY857581	MLH15	1
		D448	M0420, CMW48232	<i>P. coulteri</i>	MAT2	HAP.1	MT365442	MLH15	1
		D449	M0421, CMW48233	<i>P. coulteri</i>	MAT2	HAP.1	MT365508	MLH15	1
		D450	M0422, CMW47100	<i>P. coulteri</i>	MAT2	HAP.1	MT365443	MLH15	1
		D451	n.m.	<i>P. coulteri</i>	MAT2	HAP.1	MT365444	MLH15	1
		D452	M0424, CMW48722	<i>P. ponderosa</i>	MAT2	HAP.1	MT365445	MLH15	1
		D453	M0425, CMW48234	<i>P. ponderosa</i>	MAT2	HAP.1	MT365446	MLH15	1
		D454	M0426, CMW48235	<i>P. ponderosa</i>	MAT2	HAP.1	MT365447	MLH15	1
		D455	M0428, CMW48236	<i>P. ponderosa</i>	MAT2	HAP.1	MT365448	MLH15	1
		D456	M0429	<i>P. ponderosa</i>	MAT2	HAP.1	MT365449	MLH15	1
		D457	M0430, CMW48723	<i>P. ponderosa</i>	MAT2	HAP.1	MT365450	MLH15	1
		D458	M0431, CMW47101	<i>P. ponderosa</i>	MAT2	HAP.1	MT365451	MLH15	1
		D459	M0432	<i>P. ponderosa</i>	MAT2	HAP.1	MT365452	MLH15	1
		D480	M0436, CMW48237	<i>P. coulteri</i>	MAT2	HAP.4	MT365453	MLH06	2
		D482	M0438, CMW47102	<i>P. nigra</i>	MAT2	HAP.1	MT365454	MLH15	1
		D486	M0442, CMW48724	<i>P. schwerinii</i>	MAT2	HAP.1	MT365455	MLH14	1
		D542	n.m.	<i>P. coulteri</i>	MAT2	HAP.4	MT365458	MLH06	2
		D520	n.m.	<i>P. ponderosa</i>	MAT2	HAP.1	MT365456	MLH15	1
		D570	n.m.	<i>P. ponderosa</i>	MAT2	HAP.1	MT365463	MLH15	1
		D544	n.m.	<i>P. ponderosa</i>	MAT2	HAP.1	MT365459	MLH15	1
		D545	n.m.	<i>P. ponderosa</i>	MAT2	HAP.2	MT365460	MLH01	2
		D546	n.m.	<i>P. ponderosa</i>	MAT2	HAP.1	MT365461	MLH15	1

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		D571	n.m.	<i>P. ponderosa</i>	MAT2	HAP.1	MT365464	MLH15	1
		D572	M0561	<i>P. ponderosa</i>	MAT2	HAP.1	MT365465	MLH15	1
		D573	M0562	<i>P. ponderosa</i>	MAT2	HAP.1	MT365466	MLH15	1
		D623	n.m.	<i>P. ponderosa</i>	MAT2	HAP.1	MT365467	MLH15	1
		D726	n.m.	<i>P. coulteri</i>	MAT2	HAP.1	MT365475	MLH13	1
4	Gabčíkovo	D155	M0136, CMW 48228	<i>P. nigra</i>	MAT2	HAP.1	KY857577	MLH15	1
		D156	M0137	<i>P. nigra</i>	MAT2	HAP.1	KY857578	MLH15	1
		D157	M0138	<i>P. nigra</i>	MAT2	HAP.1	KY857579	MLH15	1
		D245	M0257	<i>P. nigra</i>	MAT2	HAP.1	MT365426	MLH13	1
		D316	M0289	<i>P. nigra</i>	MAT2	HAP.1	MT365430	MLH15	1
		D750	M0654	<i>P. nigra</i>	MAT2	HAP.1	MT365491	MLH15	1
	Jahodná	D158	M0139	<i>P. nigra</i>	MAT2	HAP.1	KY857580	MLH13	1
		D109	M0141, CMW51011	<i>P. nigra</i>	MAT2	HAP.1	KY857575	MLH15	1
		D110	n.m.	<i>P. nigra</i>	MAT2	HAP.1	KY857576	MLH13	1
		D255	M0268, CMW48229	<i>P. nigra</i>	MAT2	HAP.1	MT365427	MLH13	1
		D257	M0270, CMW49955	<i>P. nigra</i>	MAT2	HAP.1	MT365428	MLH13	1
		D295	M0276, CMW48720	<i>P. nigra</i>	MAT2	HAP.1	MT365429	MLH11	1
		D678	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365516	MLH13	1
		D681	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365468	MLH15	1
		D738	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365480	MLH13	1
		D733	M0639	<i>P. nigra</i>	MAT2	HAP.1	MT365476	MLH13	1
		D734	M0640	<i>P. nigra</i>	MAT2	HAP.1	MT365477	MLH13	1
		D735	M0641	<i>P. nigra</i>	MAT2	HAP.1	MT365478	MLH13	1
		D736	M0642	<i>P. nigra</i>	MAT2	HAP.1	MT365479	MLH09	1
		D739	M0643	<i>P. nigra</i>	MAT2	HAP.1	MT365481	MLH13	1
		D740	M0644	<i>P. nigra</i>	MAT2	HAP.1	MT365482	MLH13	1

Region	Locality	DNA ID	Culture ID <sup>a</sup>	Host tree	Mating type	ITS haplotypes	GenBank No (ITS)	MLH	DAPC/ Structure cluster
		D741	M0645	<i>P. nigra</i>	MAT2	HAP.1	MT365483	MLH15	1
		D742	M0646	<i>P. nigra</i>	MAT2	HAP.1	MT365484	MLH13	1
		D743	M0647	<i>P. nigra</i>	MAT2	HAP.1	MT365485	MLH13	1
		D747	M0651	<i>P. nigra</i>	MAT2	HAP.1	MT365489	MLH08	1
		D749	M0653	<i>P. nigra</i>	MAT2	HAP.1	MT365513	MLH13	1
		D751	M0655	<i>P. nigra</i>	MAT2	HAP.1	MT365514	MLH13	1
		D752	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365492	MLH13	1
		D758	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365496	MLH13	1
		D759	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365497	MLH13	1
		D760	M0661	<i>P. nigra</i>	MAT2	HAP.1	MT365515	MLH13	1
		D761	M0662	<i>P. nigra</i>	MAT2	HAP.1	MT365498	MLH13	1
	Trstice	D715	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365511	MLH15	1
		D724	M0632, CMW 51015	<i>P. nigra</i>	MAT2	HAP.1	MT365473	MLH13	1
		D725	M0633	<i>P. nigra</i>	MAT2	HAP.1	MT365474	MLH13	1
		D757	M0634, CMW 51016	<i>P. nigra</i>	MAT2	HAP.1	MT365495	MLH13	1
		-	M0636, CMW 51018	<i>P. nigra</i>	MAT2	HAP.1	MW110771	MLH13	1
		D748	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365490	MLH13	1
		D753	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365493	MLH15	1
		D754	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365494	MLH13	1
		D762	n.m.	<i>P. nigra</i>	MAT2	HAP.1	MT365499	MLH13	1
		D763	M0664	<i>P. nigra</i>	MAT2	HAP.1	MT365500	MLH15	1
		D769	M0665	<i>P. nigra</i>	MAT2	HAP.1	MT365503	MLH13	1
		D773	M0666	<i>P. nigra</i>	MAT2	HAP.1	MT365507	MLH13	1
		D768	M0667	<i>P. nigra</i>	MAT2	HAP.1	MT365502	MLH13	1
		D771	M0668	<i>P. nigra</i>	MAT2	HAP.1	MT365505	MLH13	1
		D772	M0669	<i>P. nigra</i>	MAT2	HAP.1	MT365506	MLH13	1

Region	Locality	DNA ID	Culture ID <sup>a</sup>	Host tree	Mating type	ITS haplotypes	GenBank No (ITS)	MLH	DAPC/ Structure cluster
		D770	M0670	<i>P. nigra</i>	MAT2	HAP.1	MT365504	MLH13	1
		D767	M0671	<i>P. nigra</i>	neg.r.	HAP.1	MT365501	MLH13	1

<sup>a</sup>Culture ID: M numbers refers to the isolates that are maintained in the culture collection of Institute of Forest Ecology SAS Zvolen, Slovakia and CMW numbers are representative isolates deposited in the culture collection of the Forestry and Agricultural Biotechnology Institute (FABI), University of Pretoria, South Africa, n.m. = culture not maintained.

<sup>b</sup>neg. r. = negative results obtained using mating type specific primers of Groenewald et al. (2007).  
host tree *P.*= *Pinus*.