SUPPLEMENTARY DATA:

SAUR Proteins as Effectors of Hormonal and Environmental Signals in Plant Growth

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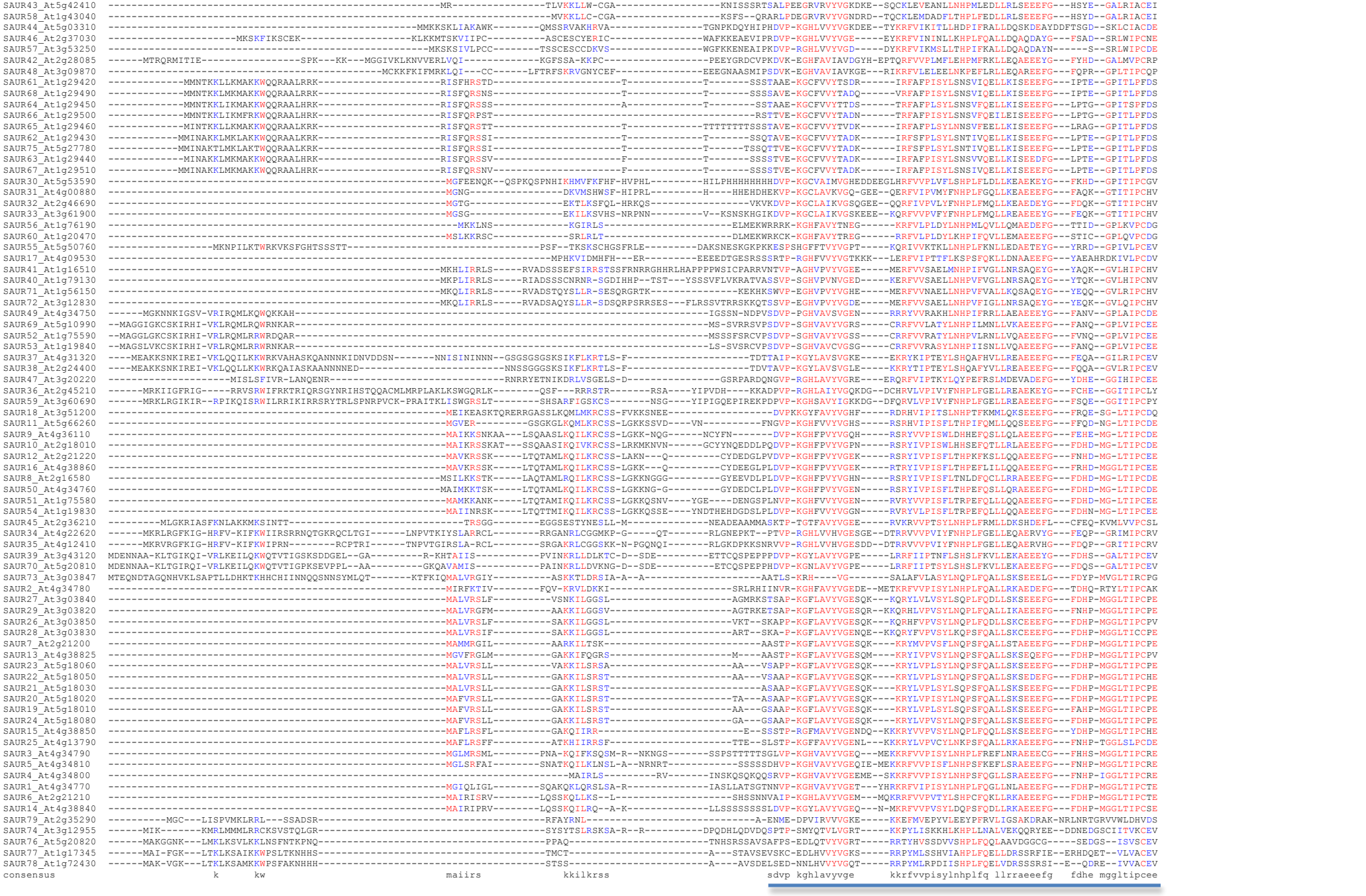
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SAUR25_At4g13790
SAUR3_At4g34790
SAUR5_At4g34810
SAUR4_At4g34800
SAUR1_At4g34770
SAUR6_At2g21210
SAUR14_At4g38840
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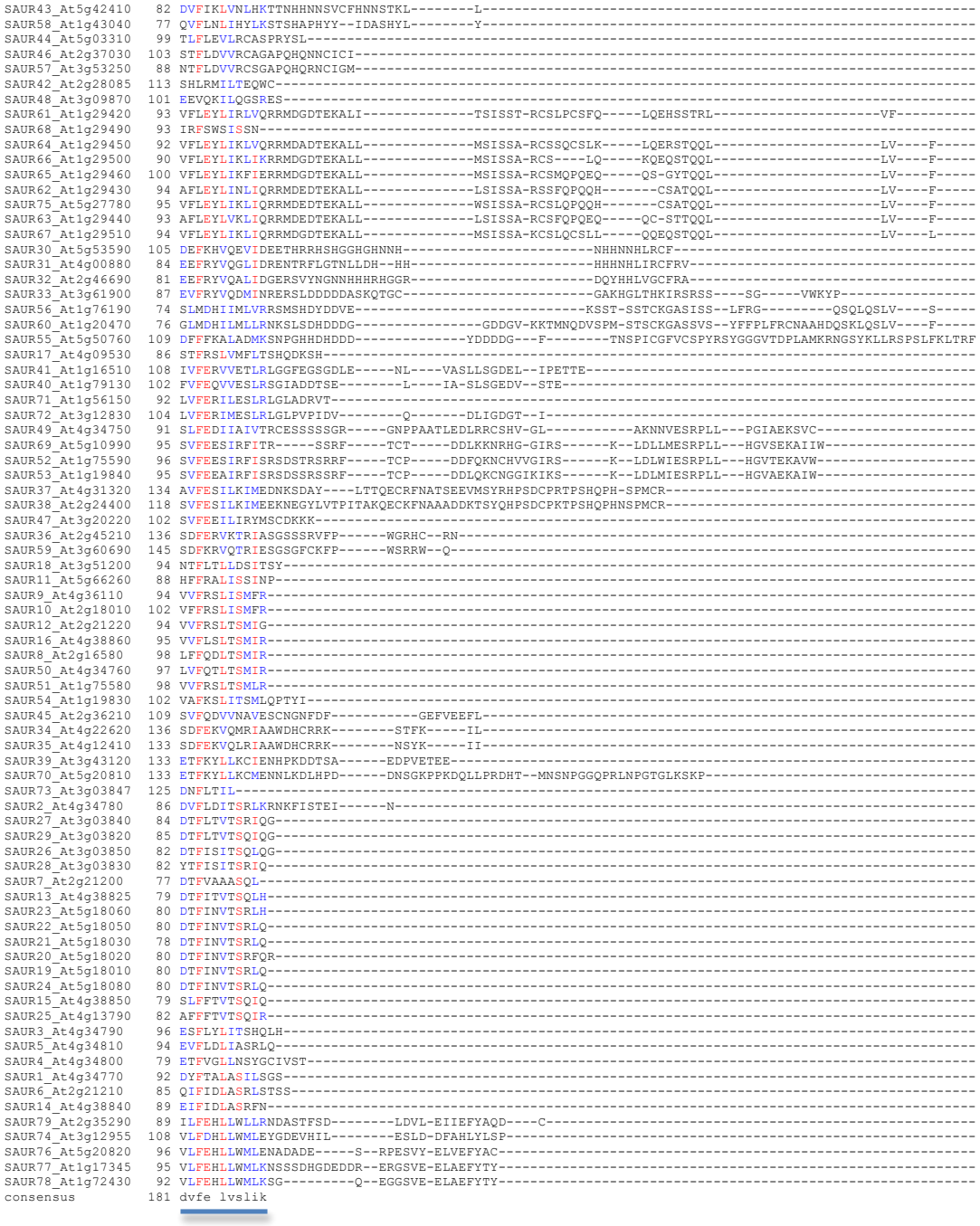
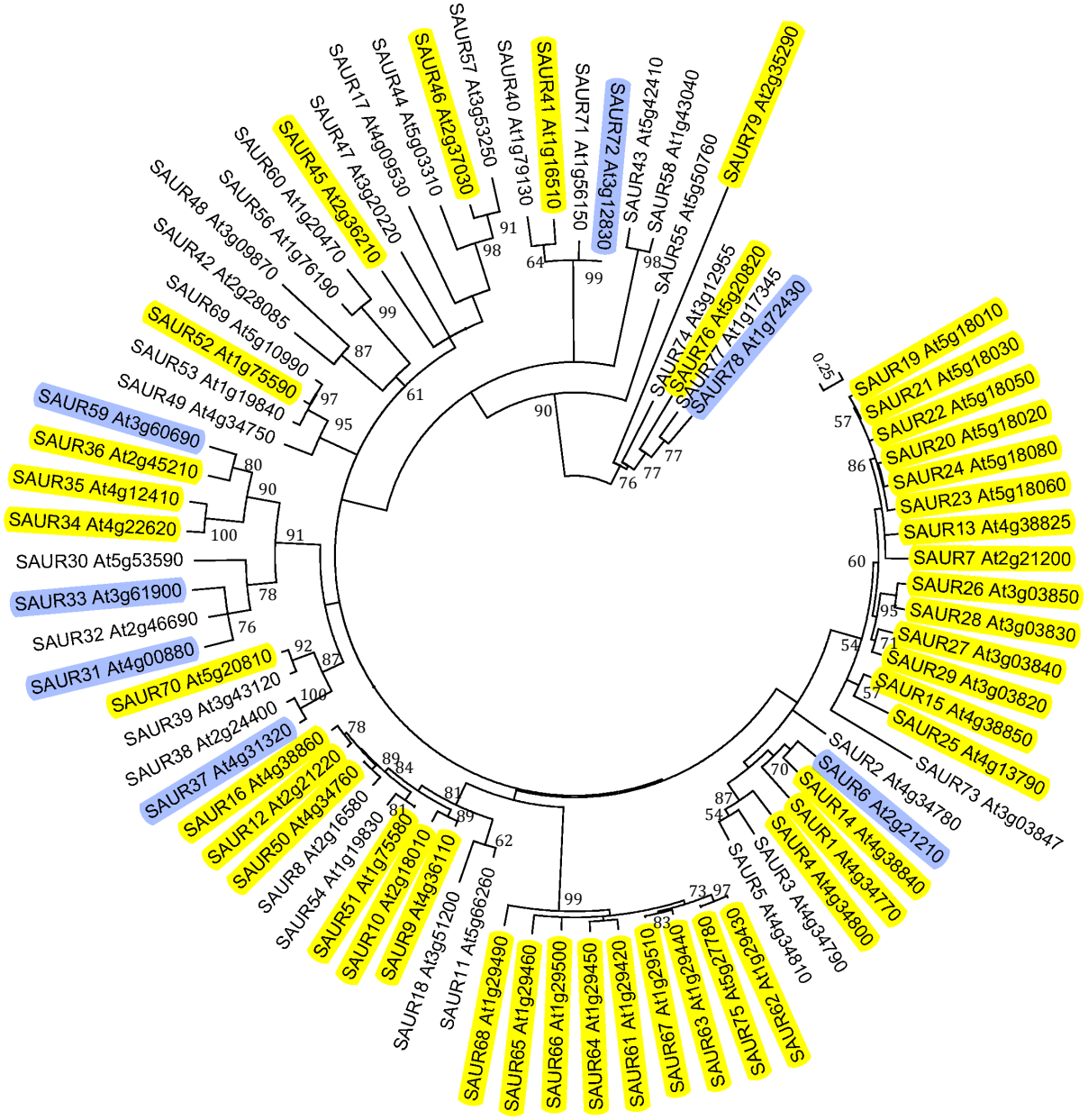
consensus



Supplementary Figure 1. Multiple protein sequence alignment of Arabidopsis SAUR family proteins. Protein sequence alignment was performed using Clustal Omega. The conserved SAUR domain sequence is underlined.

Supplementary Figure 2. Phylogenetic tree of Arabidopsis SAUR family proteins.



Supplementary Figure 2. Phylogenetic tree of Arabidopsis SAUR family proteins. Neighbor-joining phylogenetic tree was constructed using Molecular Evolutionary Genetics Analysis (MEGA 6.06). Bootstrap values were obtained from 500 replicates and branches having values > 50 are shown. Scale bar indicates an evolutionary distance of 0.25 amino acid substitutions per position. Auxin induced *SAURs* are

highlighted in yellow, and auxin repressed *SAURs* are highlighted in blue. Data were obtained from Gil et al. (1994); Tian et al. (2002); Zhao et al. (2003); Goda et al. (2004); Nemhauser et al. (2004); Redman et al. (2004); Okushima et al. (2005); Paponov et al. (2008); Chapman et al. (2012); Spartz et al. (2012); Hou et al. (2013); Kong et al. (2013); Markakis et al. (2013); Stamm and Kumar (2013).

Supplementary Table 1. Putative DST elements within the 3'-UTR of Arabidopsis SAUR genes.

Putative DST*	Experimental support
SAUR2/At4g34780**	
SAUR6/At2g21210	
SAUR8/At2g16580	
SAUR13/At4g38825	
SAUR15/At4g38850	Gil et al., 1994; Gil and Green, 1996
SAUR16/At4g38860	
SAUR22/At5g18050	
SAUR24/At5g18080**	
SAUR26/At3g03850	
SAUR27/At3g03840	
SAUR28/At3g03830	
SAUR29/At3g03820**	
SAUR31/At4g00880	
SAUR35/At4g12410**	
SAUR36/At2g45210	Hou et al., 2013
SAUR37/At4g31320**	
SAUR49/At4g34750	
SAUR50/At4g34760	
SAUR51/At1g75580	
SAUR53/At1g19840**	
SAUR54/At1g19830	
SAUR56/At1g76190**	
SAUR57/At3g53250**	
SAUR59/At3g60690	
SAUR61/At1g29420	
SAUR66/At1g29500	
SAUR68/At1g29490	
SAUR72/At3g12830	
SAUR75/At5g27780**	
SAUR79/At2g35290	

* Arabidopsis *SAUR* genes containing the DST consensus elements $GGA(N)_xATAGAT(N)_xGTA$ in their 3'-UTR sequence.
** Arabidopsis *SAUR* genes lacking annotated 3'-UTR sequences in the TAIR database. For these genes, the 500 bp of genomic sequence downstream of the stop codon were searched for the DST consensus.

Supplementary Table 2. Brassinosteroid-regulated *SAUR* genes.

SAURs	AGI number	Regulation by brassinosteroids (BR)	BZR1 binding	BES1 binding
SAUR1	AT4G34770	Induced	Yes, HC	No
SAUR7	AT2G21200	Induced	Yes, HC	No
SAUR9	AT4G36110	Induced	Yes, LC	No
SAUR10	AT2G18010	Induced	Yes, LC	No
SAUR12	AT2G21220	Induced	Yes, HC	No
SAUR14	AT4G38840	Induced	Yes, LC	No
SAUR15	AT4G38850	Induced	Yes, HC	No
SAUR16	AT4G38860	Induced	Yes, HC	Yes
SAUR23	AT5G18060	Induced	No	No
SAUR25	AT4G13790	Induced	Yes, HC	No
SAUR27	AT3G03840	Induced	No	Yes
SAUR28	AT3G03830	Induced	No	Yes
SAUR30	AT5G53590	Induced	Yes, LC	No
SAUR32	AT2G46690	Induced	No	No
SAUR50	AT4G34760	Induced	Yes, HC	No
SAUR62	AT1G29430	Induced	Yes, HC	No
SAUR63	AT1G29440	Induced	Yes, HC	No
SAUR64	AT1G29450	Induced	Yes, HC	No
SAUR65	AT1G29460	Induced	No	NO
SAUR66	AT1G29500	Induced	Yes, LC	No
SAUR67	AT1G29510	Induced	Yes, LC	No
SAUR68	AT1G29490	Induced	Yes, LC	No
SAUR75	AT5G27780	Induced	No	No
SAUR78	AT1G72430	Induced	Yes, HC	No
SAUR79	AT2G35290	Induced	Yes, LC	No
SAUR35	AT4G12410	Repressed	No	No
SAUR36	AT2G45210	Repressed	Yes, HC	Yes
SAUR41	AT1G16510	Repressed	Yes, HC	No
SAUR44	AT5G03310	Repressed	No	No
SAUR46	AT2G37030	Repressed	No	No
SAUR51	AT1G75580	Repressed	Yes, LC	No
SAUR59	AT3G60690	Repressed	Yes, HC	Yes
SAUR71	AT1G56150	Repressed	Yes, HC	No
SAUR72	AT3G12830	Repressed	No	No

Data were obtained from Wang et al. (2012). HC, high confidence; LC, low confidence.

Supplementary Table 3. Gibberellin-regulated *SAUR* genes.

SAURs	**AGI number**	**Regulation by gibberellins (GA)**
SAUR3	AT4G34790	Induced
SAUR4	AT4G34800	Induced
SAUR5	AT4G34810	Induced
SAUR8	AT2G16580	Induced
SAUR11	AT5G66260	Induced
SAUR15	AT4G38850	Induced
SAUR16	AT4G38860	Induced
SAUR19	AT5G18010	Induced
SAUR20	AT5G18020	Induced
SAUR21	AT5G18030	Induced
SAUR23	AT5G18060	Induced
SAUR24	AT5G18080	Induced
SAUR26	AT3G03850	Induced
SAUR27	AT3G03840	Induced
SAUR28	AT3G03830	Induced
SAUR29	AT3G03820	Induced
SAUR46	AT2G37030	Induced
SAUR49	AT4G34750	Induced
SAUR50	AT4G34760	Induced
SAUR53	AT1G19840	Induced
SAUR55	AT5G50760	Induced
SAUR57	AT3G53250	Induced
SAUR64	AT1G29450	Induced
SAUR65	AT1G29460	Induced
SAUR66	AT1G29500	Induced
SAUR67	AT1G29510	Induced
SAUR68	AT1G29490	Induced
SAUR31	AT4G00880	Repressed
SAUR71	AT1G56150	Repressed

Data were obtained from Bai et al. (2012).

Supplementary Table 4. Abscisic acid- and jasmonate-regulated *SAUR* genes.

SAURs	**AGI number**	**Regulation by abscisic acid (ABA)**
SAUR30	AT5G53590	Induced
SAUR36	AT2G45210	Induced
SAUR41	AT1G16510	Induced
SAUR59	AT3G60690	Induced
SAUR72	AT3G12830	Induced
SAUR1	AT4G34770	Repressed
SAUR6	AT2G21210	Repressed
SAUR12	AT2G21220	Repressed
SAUR14	AT4G38840	Repressed
SAUR16	AT4G38860	Repressed
SAUR31	AT4G00880	Repressed
SAUR50	AT4G34760	Repressed
SAUR55	AT5G50760	Repressed
SAUR62	AT1G29430	Repressed
SAUR78	AT1G72430	Repressed
SAURs	**AGI number**	**Regulation by methyl jasmonate (MJ)**
SAUR9	AT4G36110	Induced
SAUR1	AT4G34770	Repressed
SAUR14	AT4G38840	Repressed
SAUR16	AT4G38860	Repressed
SAUR23	AT5G18060	Repressed
SAUR31	AT4G00880	Repressed
SAUR36	AT2G45210	Repressed
SAUR49	AT4G34750	Repressed
SAUR50	AT4G34760	Repressed
SAUR59	AT3G60690	Repressed
SAUR62	AT1G29430	Repressed
SAUR63	AT1G29440	Repressed

Data were obtained from Nemhauser et al. (2006).