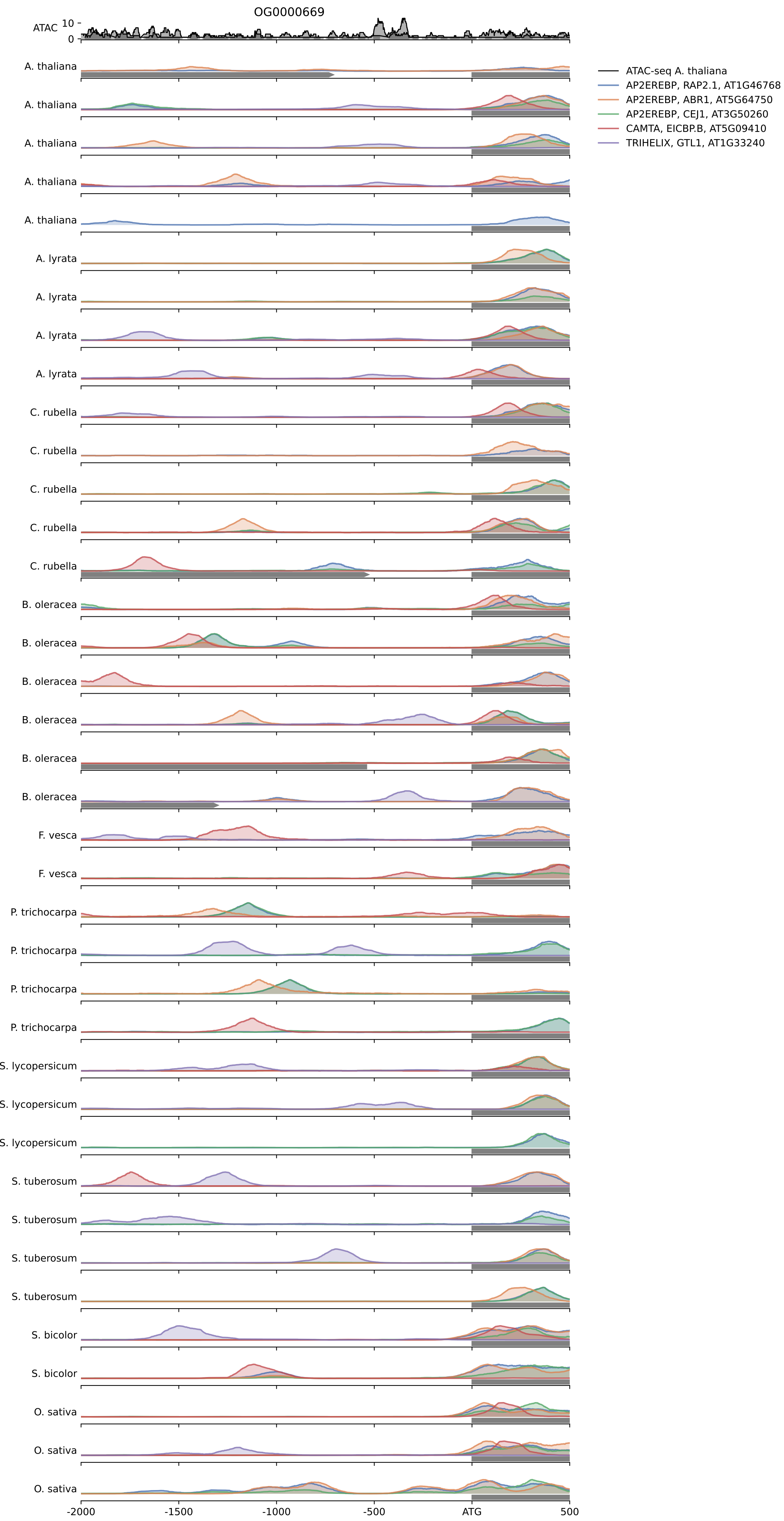




A. thaliana target: AT5G60480, HB26, homeobox protein 26;(source:Araport11)

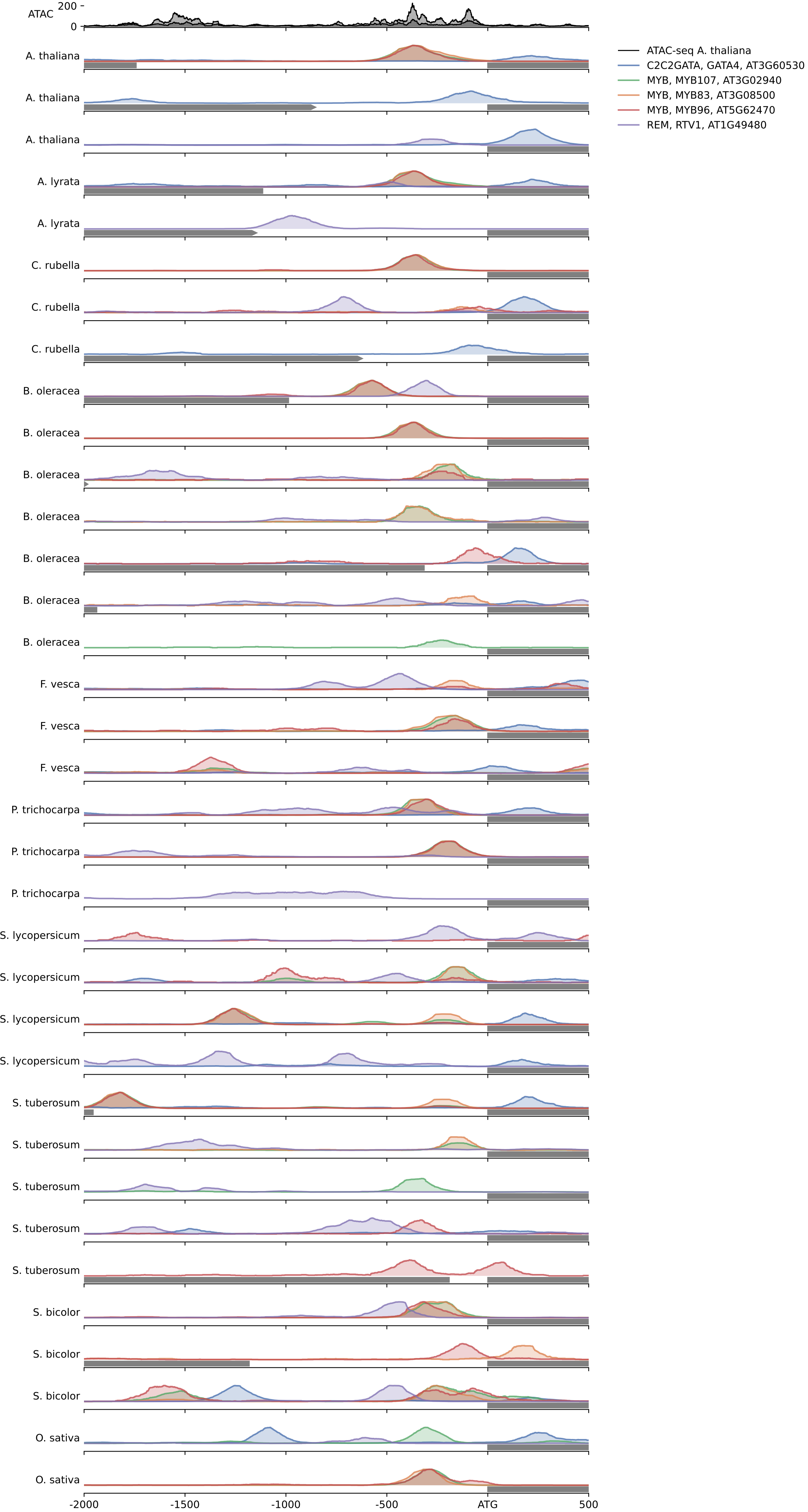
A. thaliana target: AT3G28920, HB34, homeobox protein 34;(source:Araport11)

A. thaliana target: AT5G39760, HB23, Functions together with TZP in co-regulation of the expression of blue-light dependent transcriptional regulators. Coassociates with and regulates the expression of light-regulated loci as well as transcriptional regulators to shape plant development in response to environmental stimuli with targets in RNA processing factors as well as proteins involved in salt stress and ABA signaling, in addition to embryo development. Acts downstream of TZP action with regard to blue-light-regulated hypocotyl elongation.

A. thaliana target: AT1G69600, ZFHD1, Encodes ZFHD1, a member of the zinc finger homeodomain transcriptional factor family. Binds to the 62 bp promoter region of ERD1 (early responsive to dehydration stress 1). Expression of ZFHD1 is induced by drought, high salinity and abscisic acid.

A. thaliana target: AT5G15210, HB30, Encodes ZFHD3, a member of the zinc finger homeodomain transcriptional factor family.

OG0000673

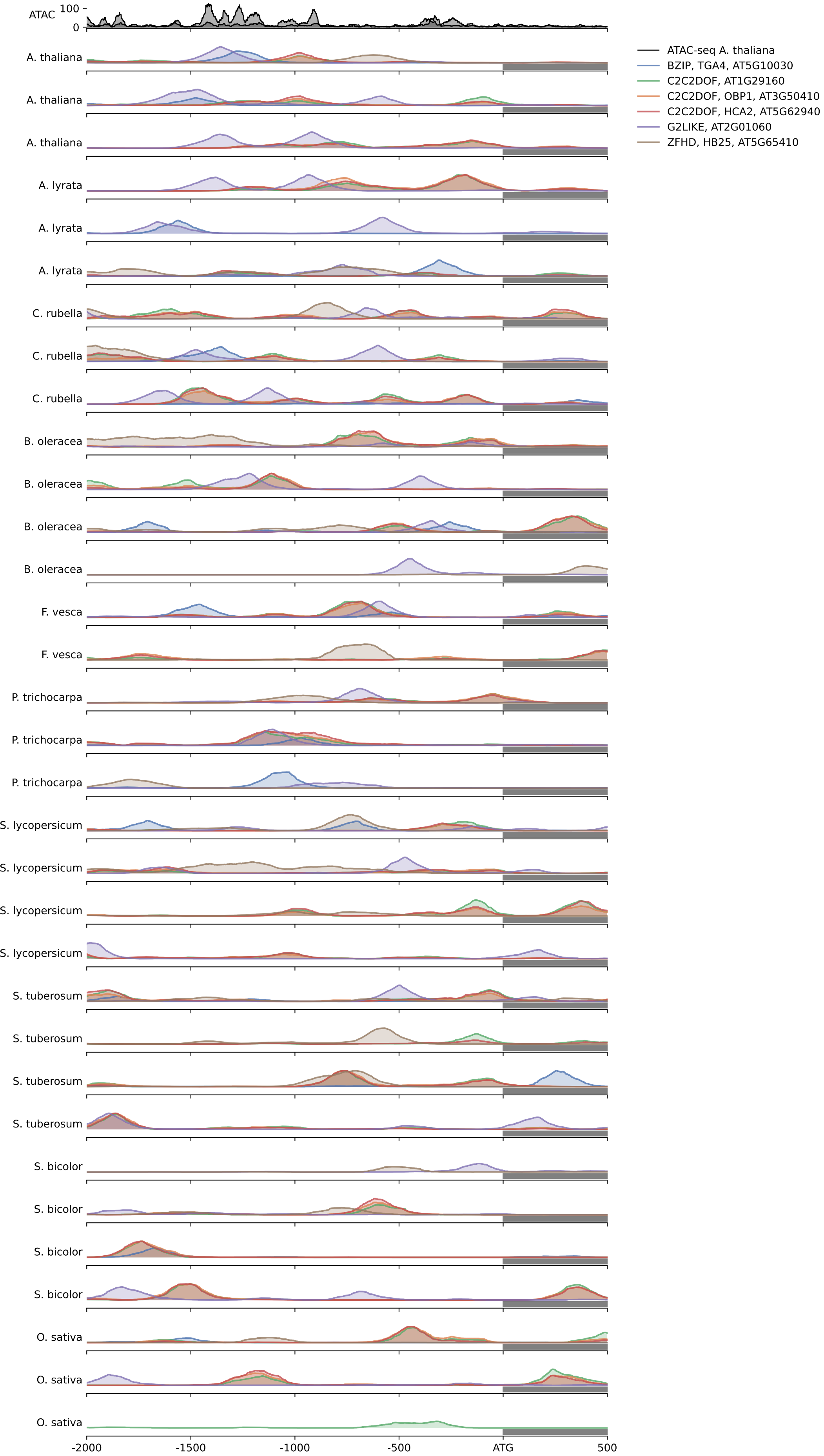


A. thaliana target: AT2G32720, CB5-B, Participates with ELO2 in VLCFA synthesis.

A. thaliana target: AT5G53560, CB5-E, Encodes a cytochrome b5 isoform that can be reduced by AtCBR, a cytochrome b5 reductase.

A. thaliana target: AT5G48810, CB5-D, Encodes a cytochrome b5 isoform that localizes to the ER. The C-terminal portion of the protein appears to be capable of inserting into a plant microsomal membrane in vitro and the protein appears to be subject to glycosylation. The mRNA is cell-to-cell mobile.

OG0000674

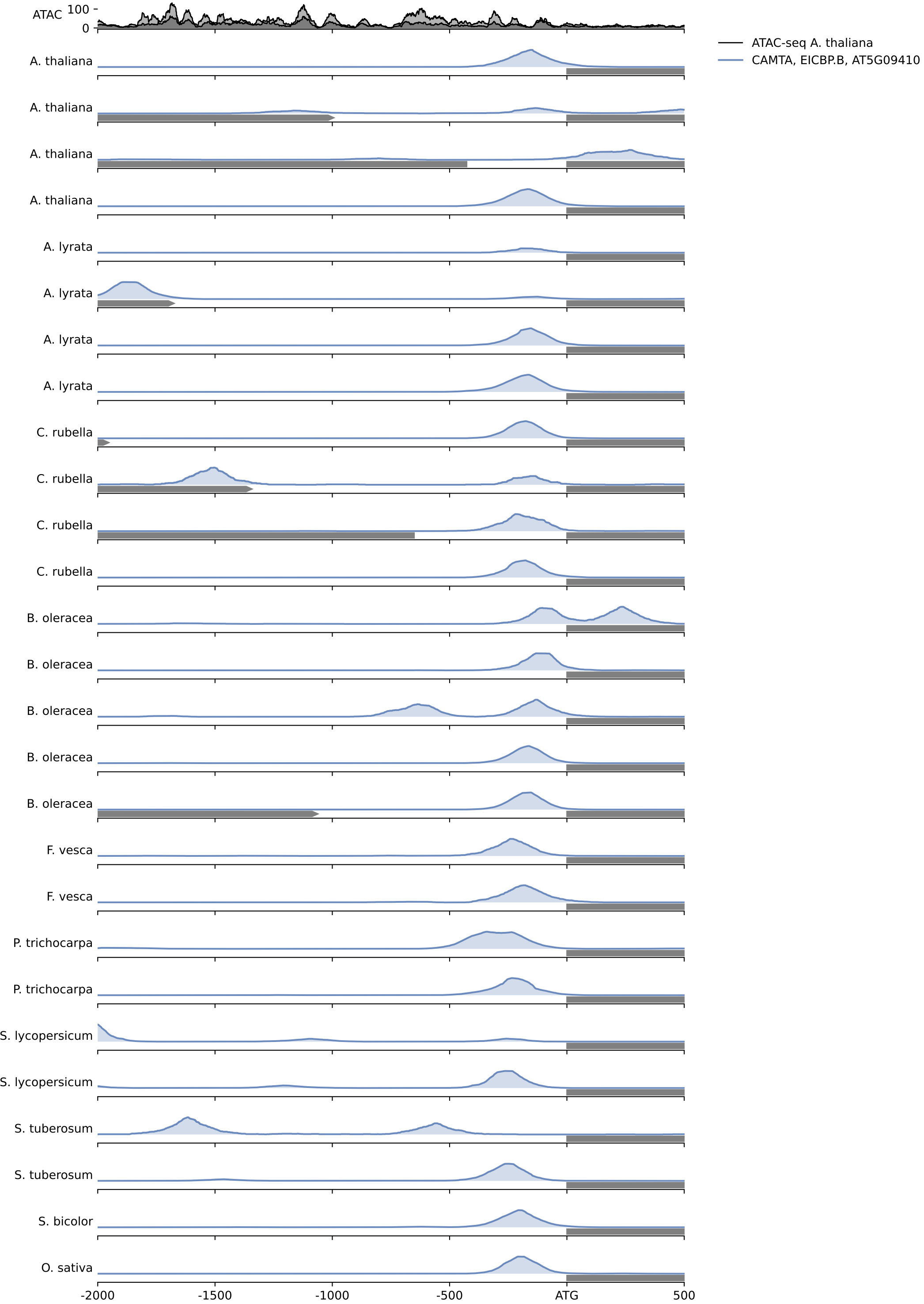


A. thaliana target: AT1G53310, PPC1, Encodes one of four Arabidopsis phosphoenolpyruvate carboxylase proteins.Plays an important role in carbon and nitrogen metabolism.

A. thaliana target: AT3G14940, PPC3, Encodes a cytosolic phosphoenolpyruvate carboxylase (PEPC) that has activity when expressed in E.coli. Its mRNA is most abundantly expressed in roots and siliques. PPC3 belongs to the plant-type PEPC family. It can form an enzymatically active complex with a castor bean ortholog of PPC4, which encodes a bacterial-type PEPC. The mRNA is cell-to-cell mobile.

A. thaliana target: AT2G42600, PPC2, Encodes one of four Arabidopsis phosphoenolpyruvate carboxylase proteins.PPC1 and PPC2 are crucial for balancing carbon and nitrogen metabolism.

OG0000675



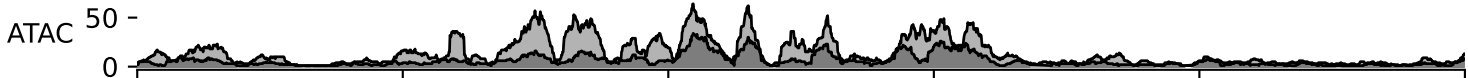
A. thaliana target: AT3G11650, NHL2, Encodes a protein whose sequence is similar to tobacco hairpin-induced gene (HIN1) and Arabidopsis non-race specific disease resistance gene (NDR1). Expression of this gene is induced by cucumber mosaic virus and spermine. Overexpression of the gene induces the expression of PR-1 gene and shows light-dependent 'speck disease-like' symptom on leaves. The gene product is localized to the chloroplast

A. thaliana target: AT2G35980, YLS9, Encodes a protein whose sequence is similar to tobacco hairpin-induced gene (HIN1) and Arabidopsis non-race specific disease resistance gene (NDR1). Expression of this gene is induced by cucumber mosaic virus, spermine and during senescence. The gene product is localized to the chloroplast. The mRNA is cell-to-cell mobile.

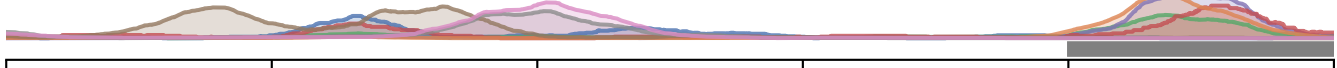
A. thaliana target: AT2G35460, Late embryogenesis abundant (LEA) hydroxyproline-rich glycoprotein family;(source:Araport11)

A. thaliana target: AT5G06320, NHL3, encodes a protein whose sequence is similar to tobacco hairpin-induced gene (HIN1) and Arabidopsis non-race specific disease resistance gene (NDR1). Expression of this gene is induced by cucumber mosaic virus, spermine and *Pseudomonas syringae* pv. tomato DC3000. The gene product is localized to the plasma membrane.

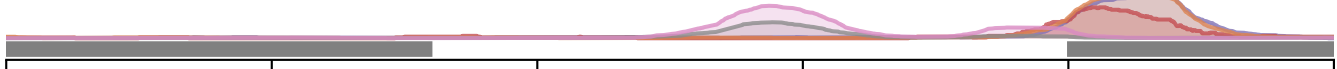
OG0000676



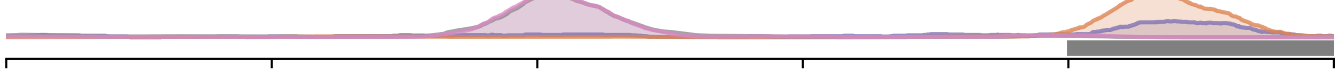
A. thaliana



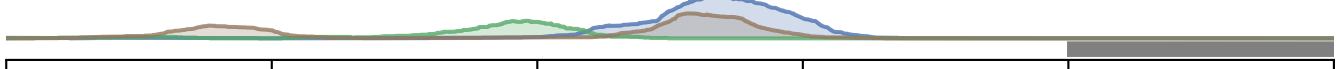
A. thaliana



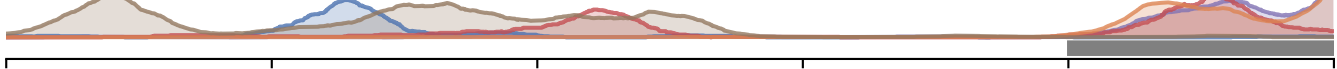
A. thaliana



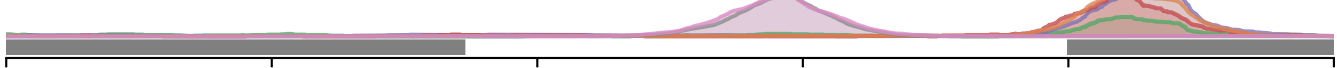
A. lyrata



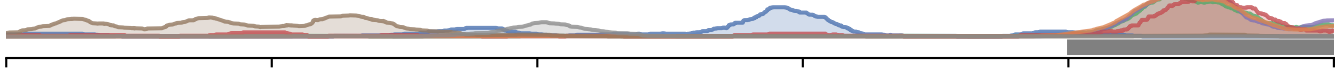
A. lyrata



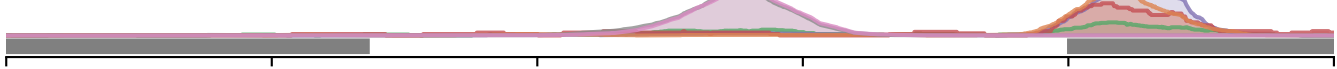
A. lyrata



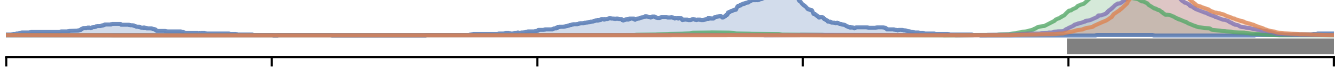
C. rubella



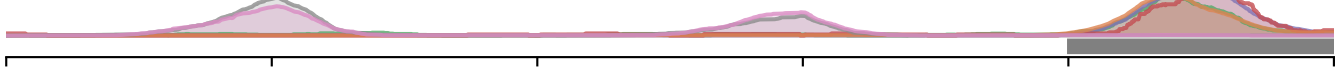
C. rubella



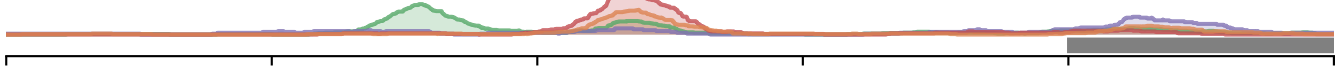
C. rubella



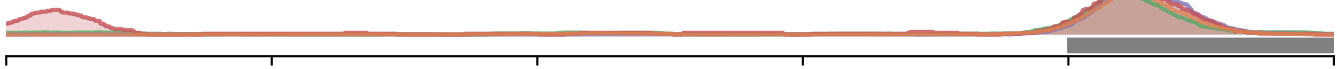
B. oleracea



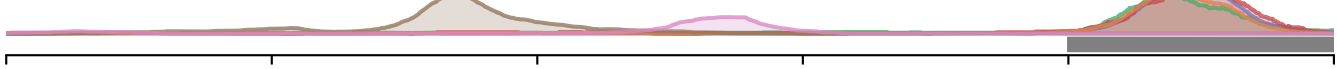
B. oleracea



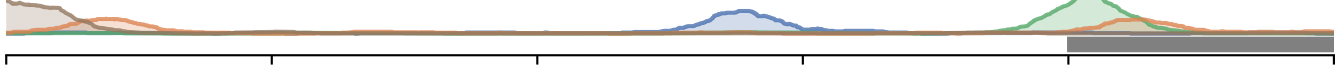
B. oleracea



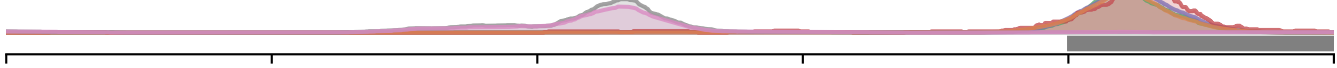
B. oleracea



B. oleracea



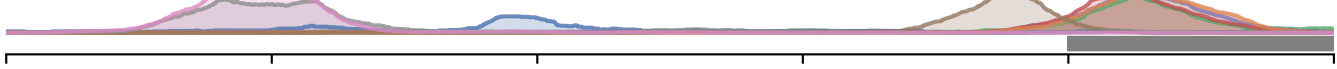
B. oleracea



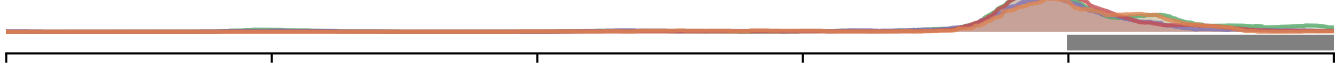
B. oleracea



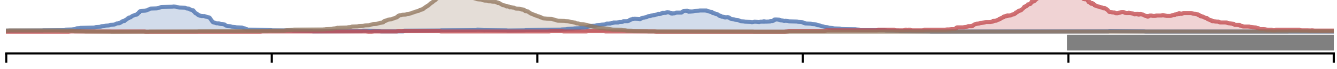
F. vesca



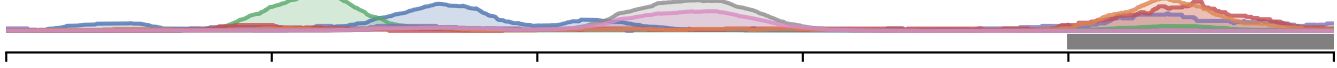
F. vesca



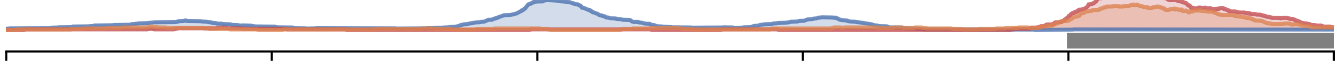
P. trichocarpa



P. trichocarpa



P. trichocarpa



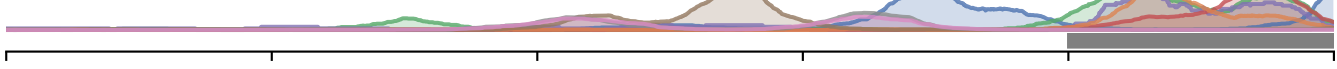
P. trichocarpa



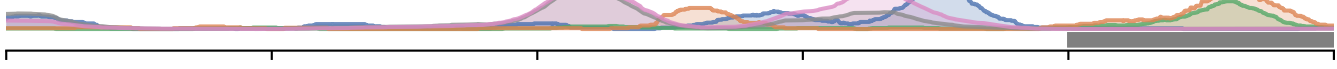
S. lycopersicum



S. lycopersicum



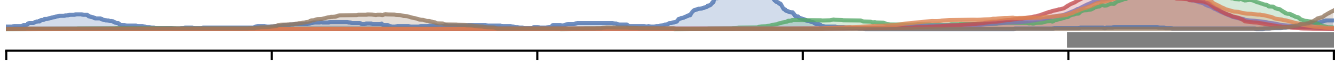
S. lycopersicum



S. lycopersicum



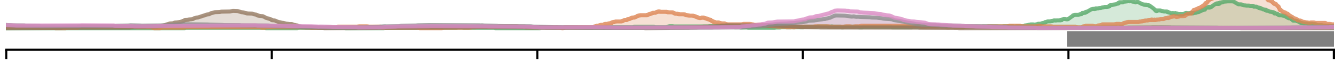
S. tuberosum



S. tuberosum



S. tuberosum



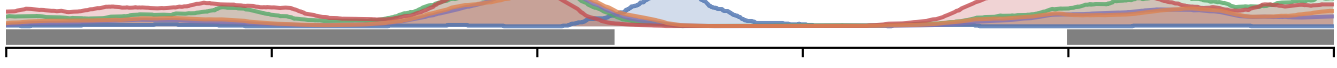
S. tuberosum



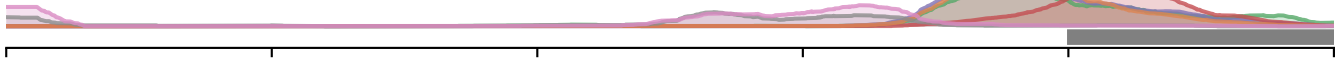
S. bicolor



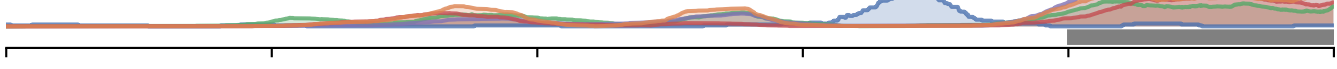
S. bicolor



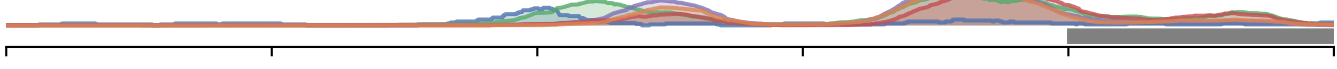
O. sativa



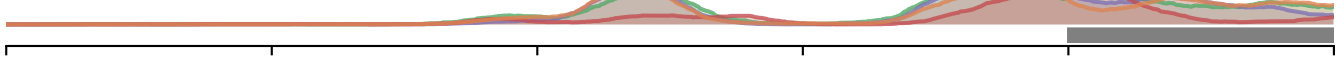
O. sativa



O. sativa



O. sativa



O. sativa



- ATAC-seq A. thaliana
- ABI3VP1, VRN1, AT3G18990
- AP2EREBP, RAP2.1, AT1G46768
- AP2EREBP, PUCHI, AT5G18560
- AP2EREBP, RAP2.11, AT5G19790
- AP2EREBP, ABR1, AT5G64750
- G2LIKE, AT2G01060
- MYBRELATED, EPR1, AT1G18330
- MYBRELATED, RVE1, AT5G17300

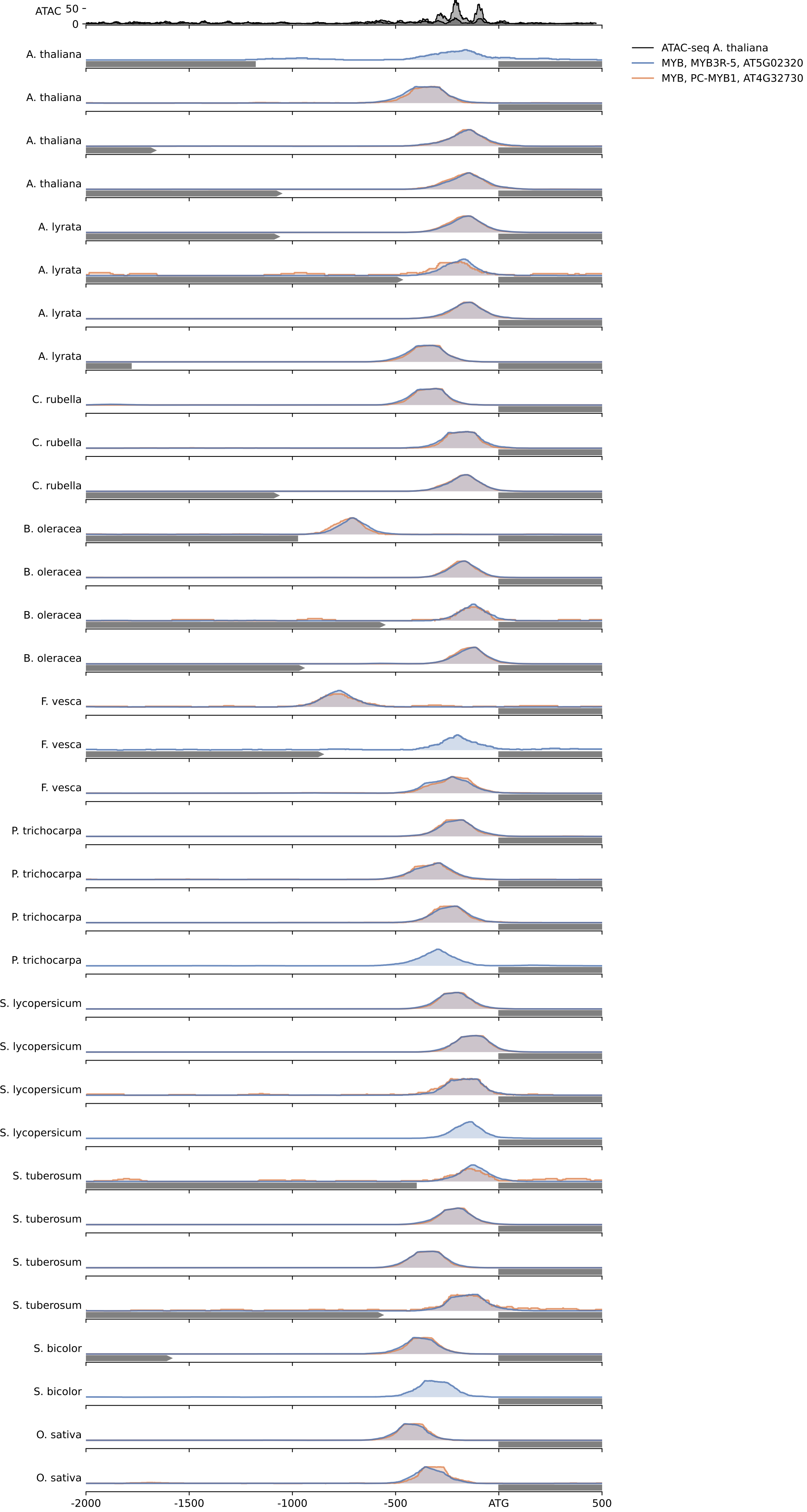
-2000 -1500 -1000 -500 ATG 500

A. thaliana target: AT3G11690, hypothetical protein;(source:Araport11)

A. thaliana target: AT5G06380, hypothetical protein;(source:Araport11)

A. thaliana target: AT2G27180, hypothetical protein;(source:Araport11)

OG0000678



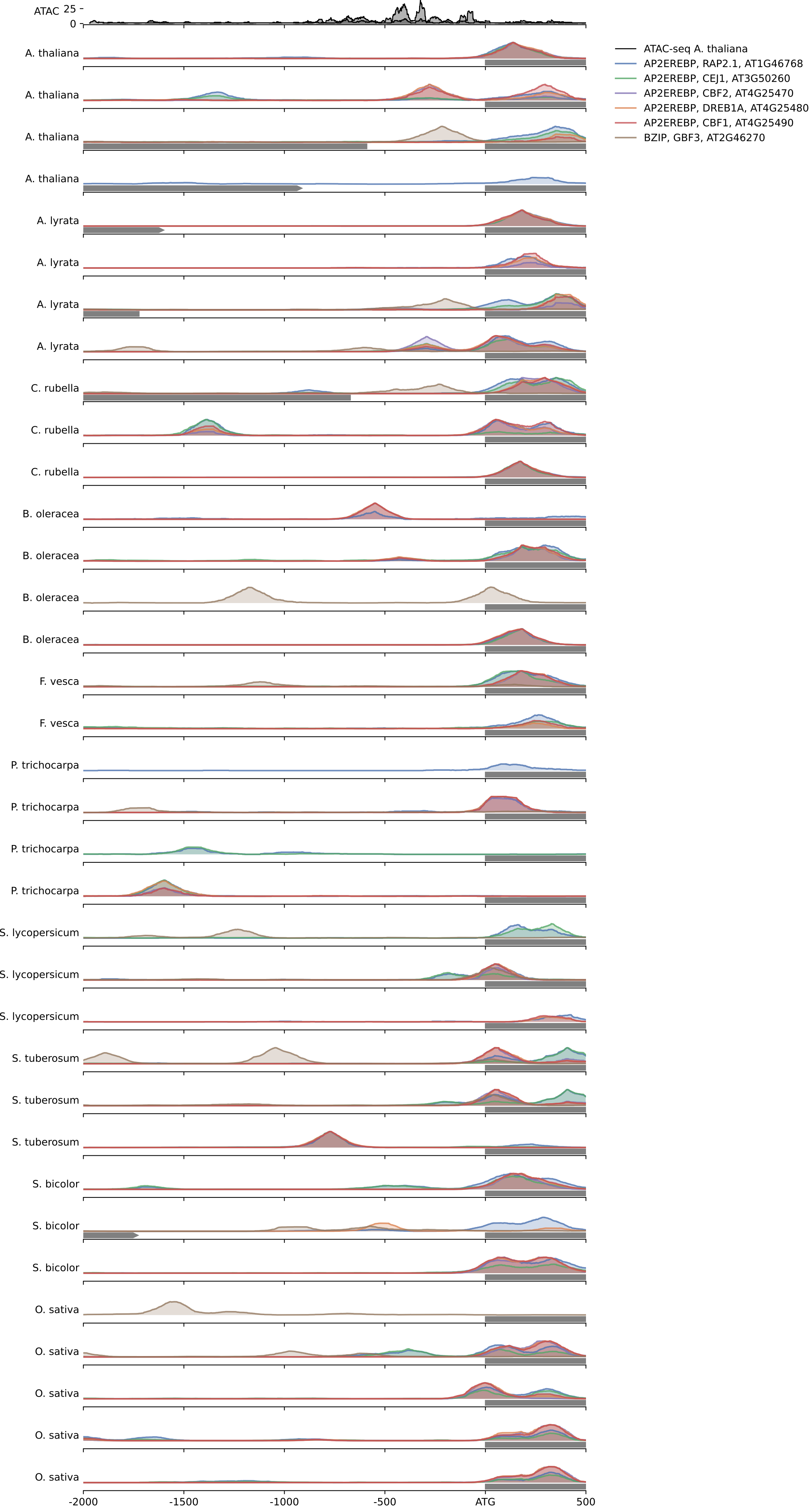
A. thaliana target: AT4G37490, CYCB1;1, Cyclin-dependent protein kinase CYCB1;1. Functions as an effector of growth control at G2/M. Regulated by TCP20.

A. thaliana target: AT2G26760, CYCB1;4, Cyclin B1;(source:Araport11)

A. thaliana target: AT3G11520, CYCB1;3, Encodes a B-type mitotic cyclin.

A. thaliana target: AT5G06150, CYC1BAT, Encodes a cyclin whose expression is reduced in response to high salt.

OG0000689



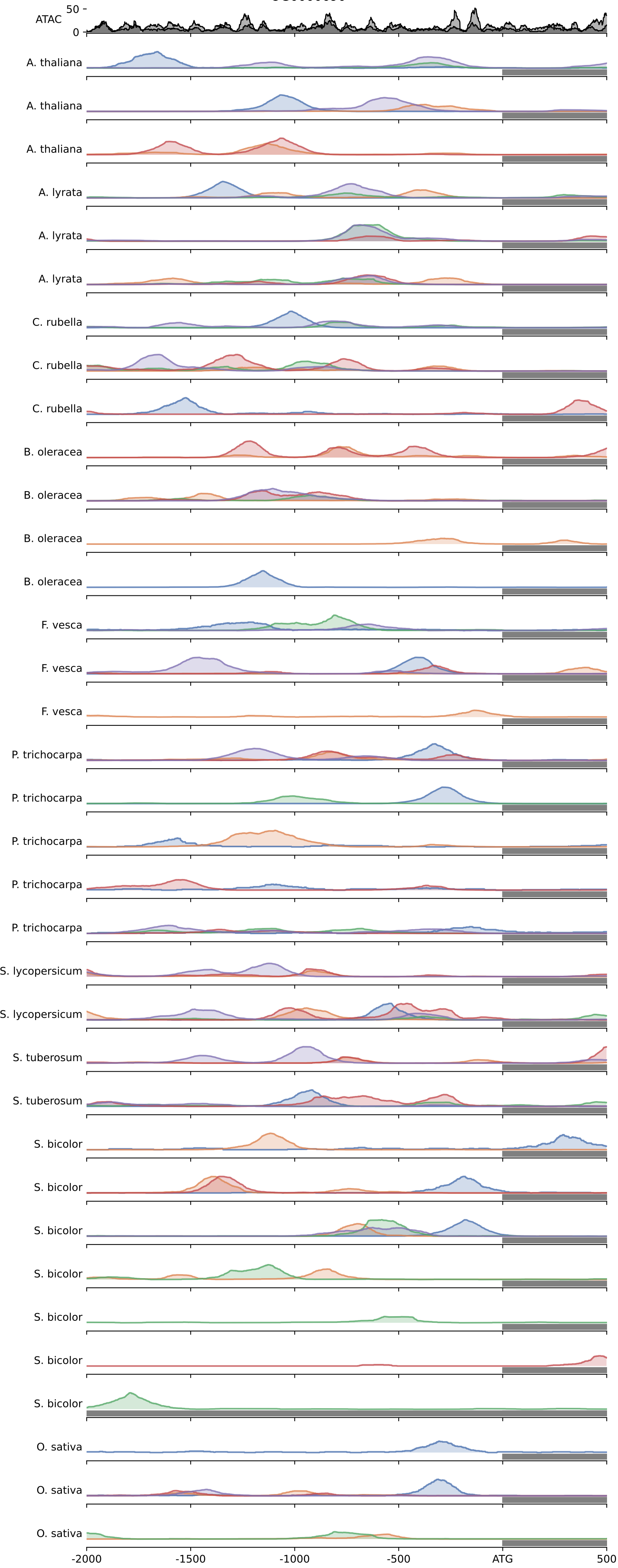
A. thaliana target: AT5G01330, PDC3, pyruvate decarboxylase

A. thaliana target: AT4G33070, Encodes hypoxia and drought induced pyruvate decarboxylase, which catalyzes the first step in ethanolic fermentation.

A. thaliana target: AT5G54960, PDC2, pyruvate decarboxylase-2

A. thaliana target: AT5G01320, Thiamine pyrophosphate dependent pyruvate decarboxylase family protein;(source:Araport11)

OG0000690

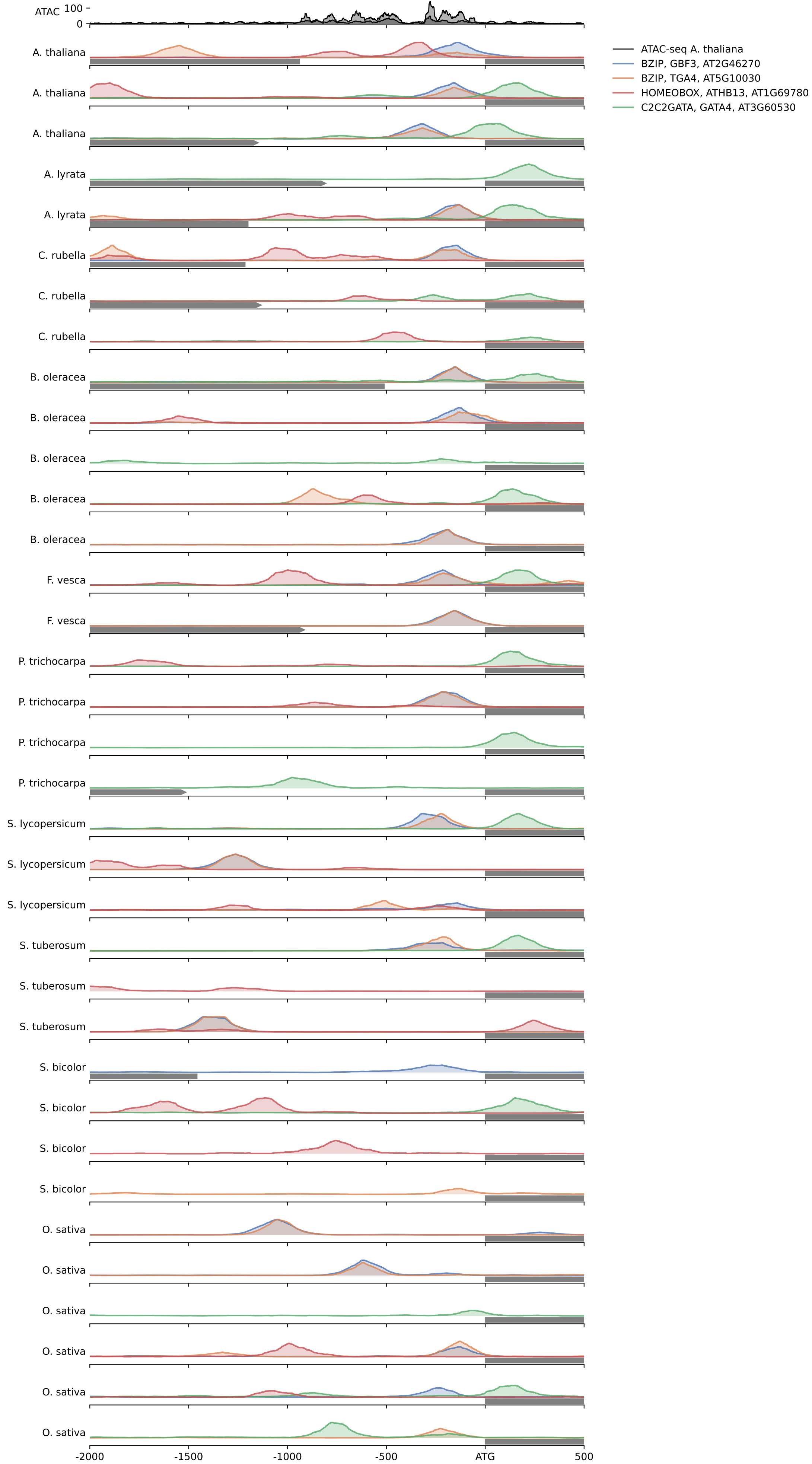


A. thaliana target: AT4G12350, MYB42, Encodes a transcriptional regulator that directly activates lignin biosynthesis genes and phenylalanine biosynthesis genes during secondary wall formation.

A. thaliana target: AT4G22680, MYB85, Encodes a transcriptional regulator that directly activates lignin biosynthesis genes and phenylalanine biosynthesis genes during secondary wall formation.

A. thaliana target: AT1G66230, MYB20, Encodes a transcriptional regulator that directly activates lignin biosynthesis genes and phenylalanine biosynthesis genes during secondary wall formation.

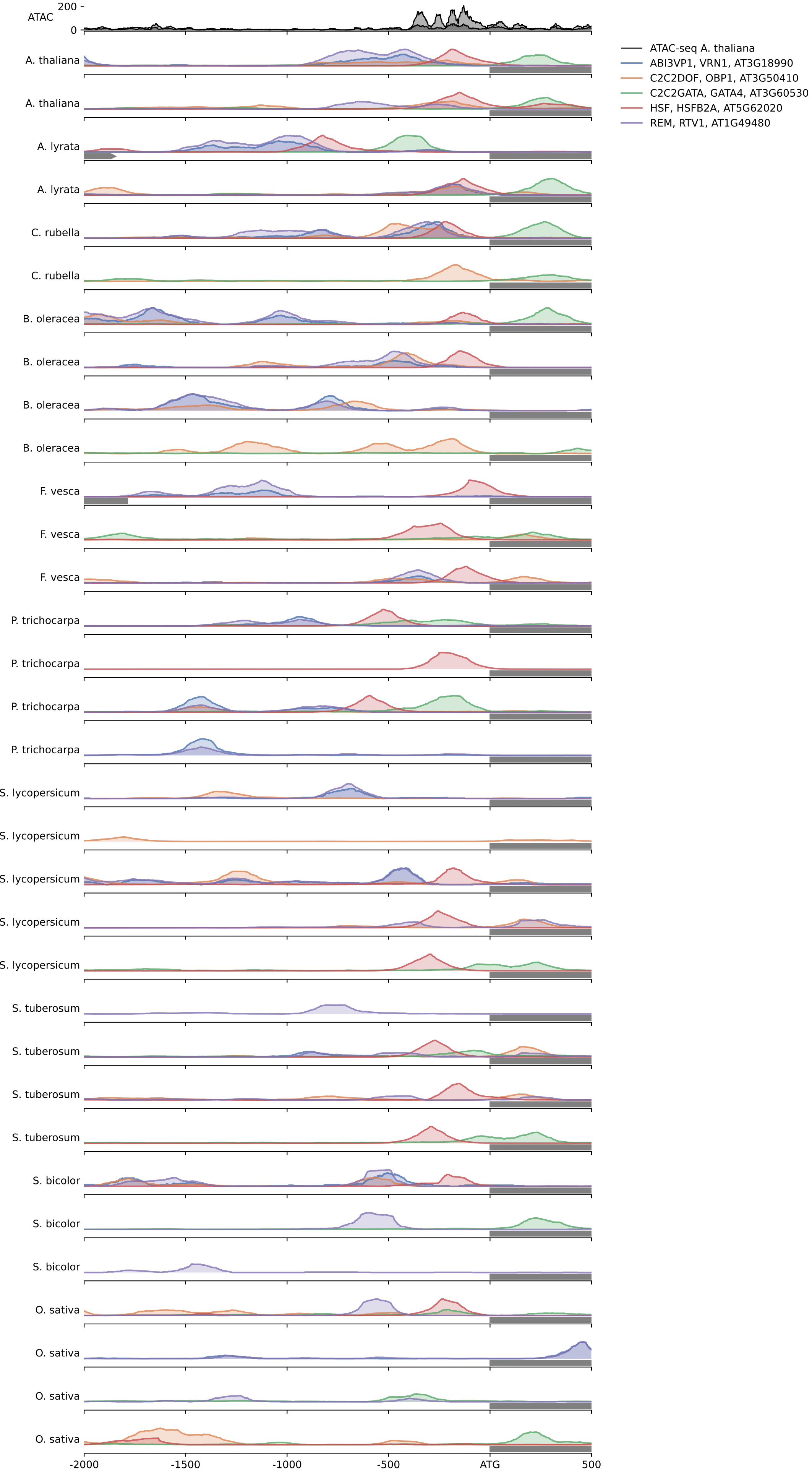
OG0000701



A. thaliana target: AT1G09080, BIP3, Member of the HSP70 family of heat shock proteins. Induced by stress and unfolded protein response. A target of several bZIP proteins.

A. thaliana target: AT5G28540, BIP1, Encodes the luminal binding protein BiP, an ER-localized member of the HSP70 family. BiP is composed of an N-terminal ATP binding domain and a C-terminal domain that binds to hydrophobic patches on improperly/incompletely folded proteins in an ATP-dependent manner. Involved in polar nuclei fusion during proliferation of endosperm nuclei.

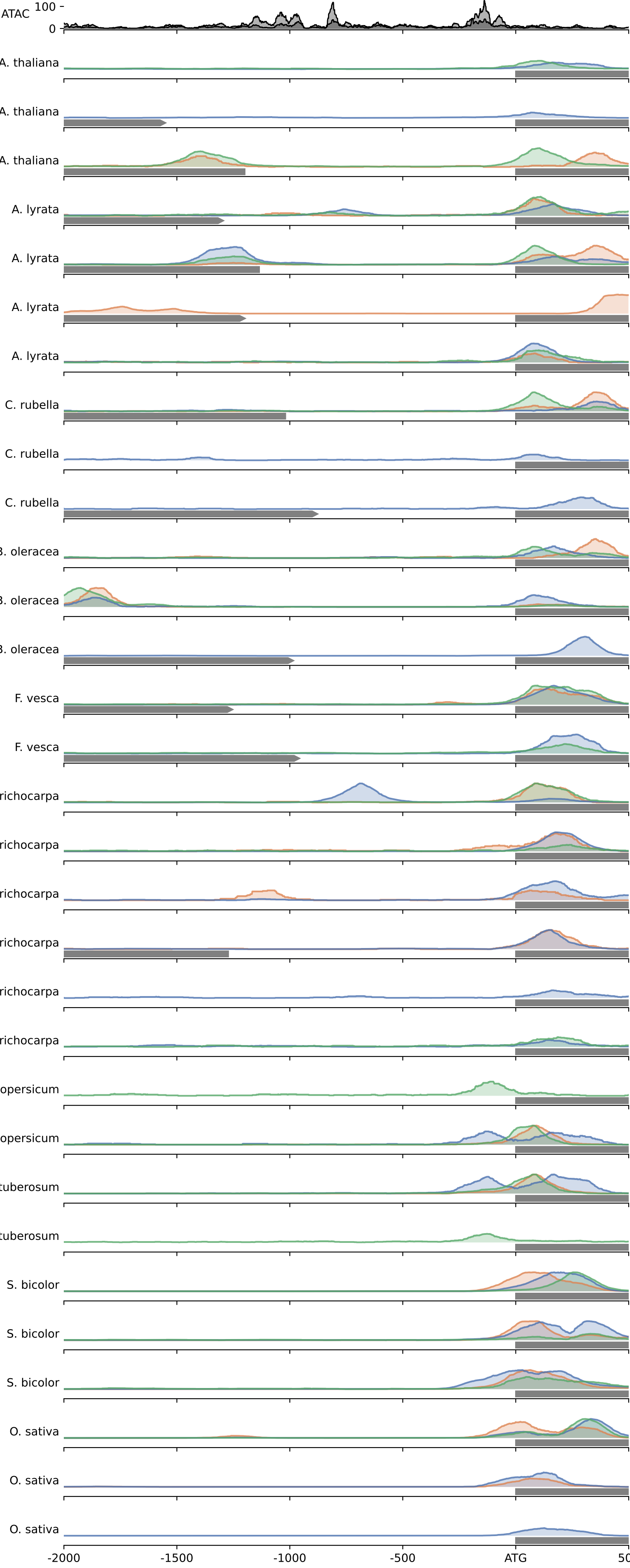
A. thaliana target: AT5G42020, BIP2, Luminal binding protein (BiP2) involved in polar nuclei fusion during proliferation of endosperm nuclei.



A. thaliana target: AT3G44110, J3, Homologous to the co-chaperon DNAJ protein from E coli. Member of the HSP40 family. Interacts with HSP70-4(AT3G12580) to mediate heat shock response. Formation of HSGs is dependent on the farnyslation status of J3.

A. thaliana target: AT5G22060, J2, Co-chaperonin similar to E. coli DnaJ

OG0000725

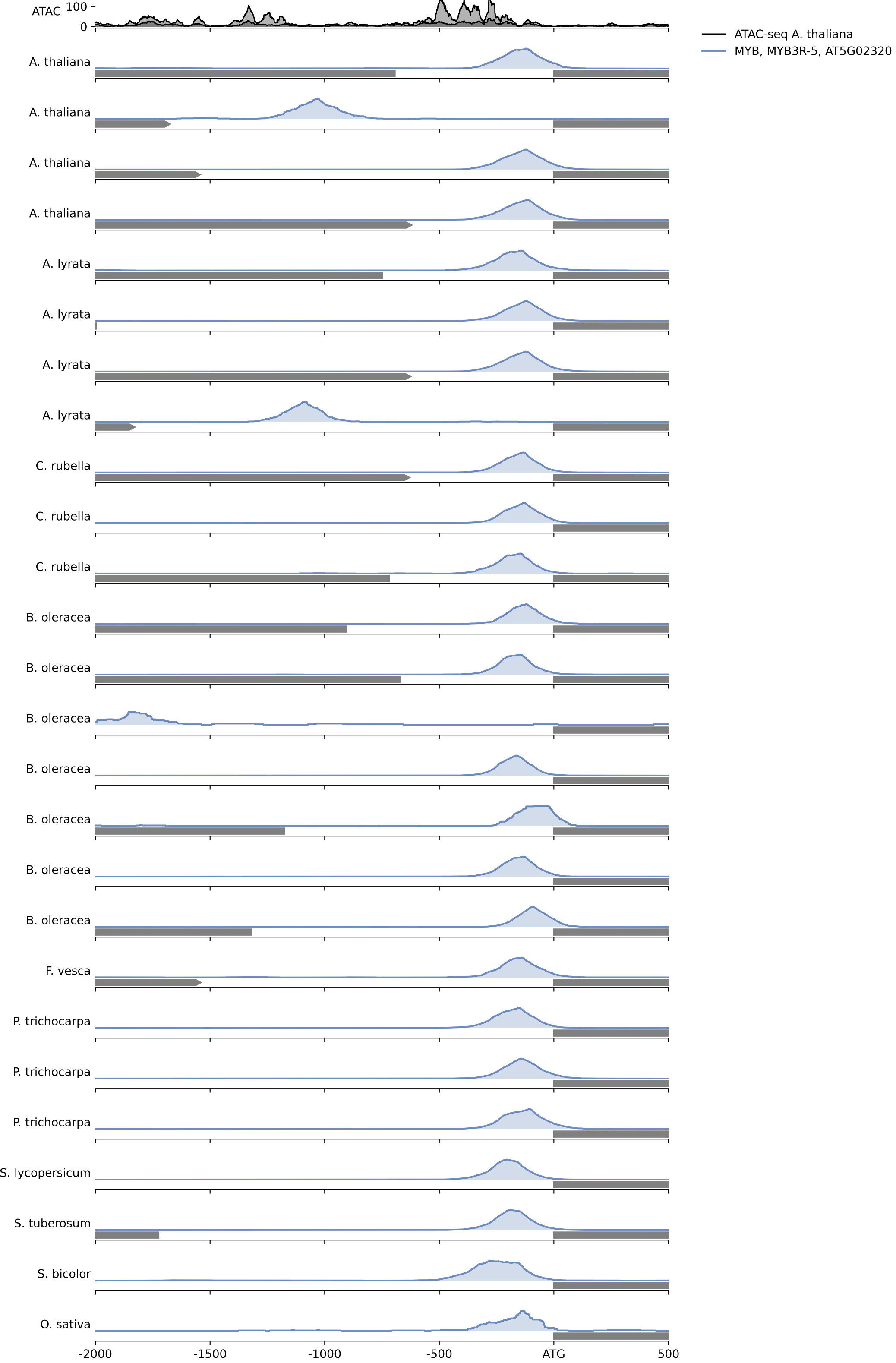


- ATAC-seq *A. thaliana*
- AP2EREBP, ABR1, AT5G64750
- TRIHELIX, AT5G05550
- AP2EREBP, RAP2.11, AT5G19790

A. thaliana target: AT5G23700, coiled-coil protein;(source:Araport11)

A. thaliana target: AT5G13260, myosin;(source:Araport11)

A. thaliana target: AT3G48860, coiled-coil protein;(source:Araport11)

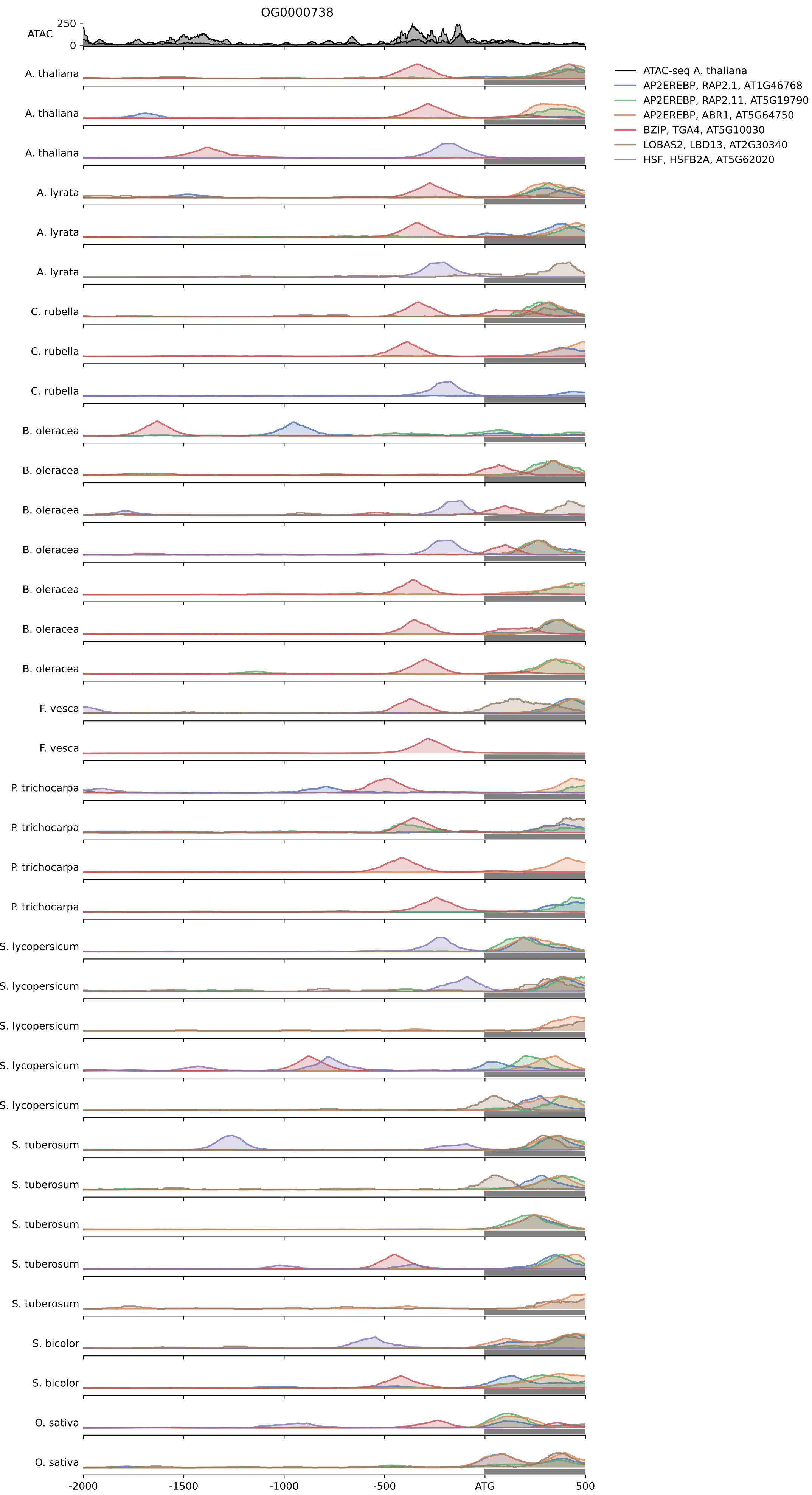


A. thaliana target: AT4G31840, ENODL15, early nodulin-like protein 15;(source:Araport11)

A. thaliana target: AT4G30590, ENODL12, early nodulin-like protein 12;(source:Araport11)

A. thaliana target: AT2G25060, ENODL14, early nodulin-like protein 14;(source:Araport11)

A. thaliana target: AT5G25090, ENODL13, early nodulin-like protein 13;(source:Araport11)

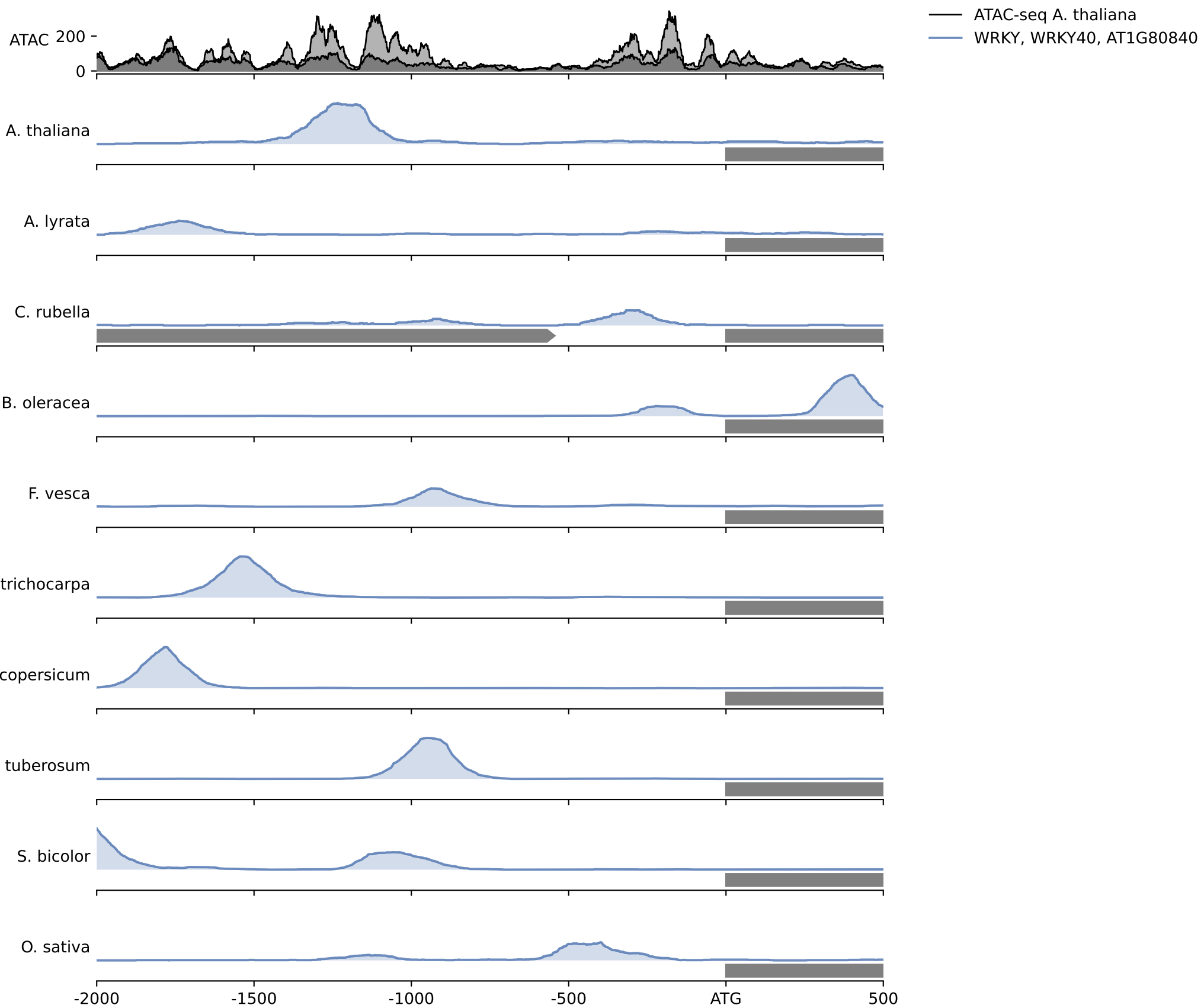


A. thaliana target: AT4G17500, ERF-1, Encodes a member of the ERF (ethylene response factor) subfamily B-3 of ERF/AP2 transcription factor family (ATERF-1). The protein contains one AP2 domain. There are 18 members in this subfamily including ATERF-1, ATERF-2, AND ATERF-5. The mRNA is cell-to-cell mobile.

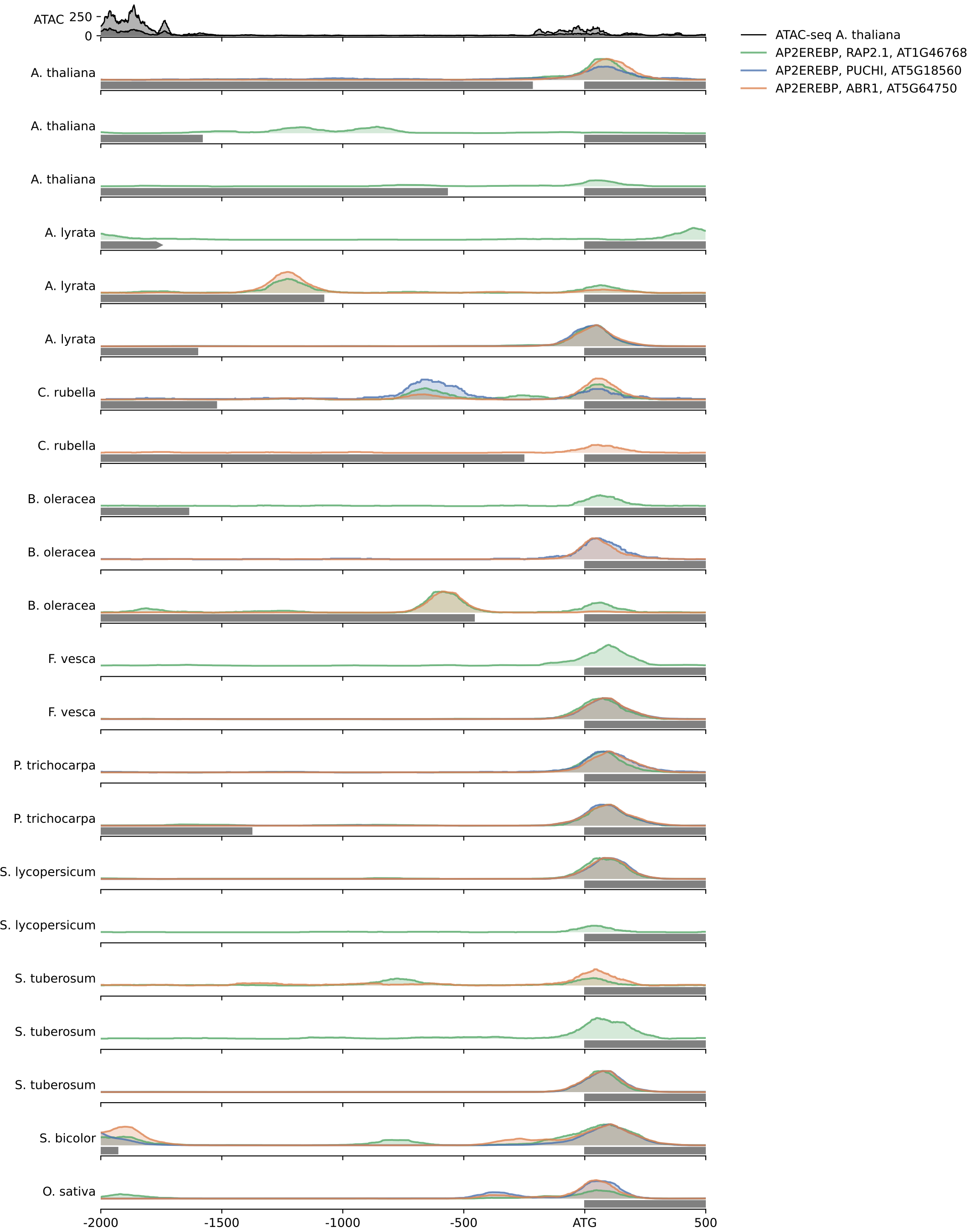
A. thaliana target: AT5G47220, ERF2, Encodes a member of the ERF (ethylene response factor) subfamily B-3 of ERF/AP2 transcription factor family (ATERF-2). The protein contains one AP2 domain. Functions as activator of GCC box?dependent transcription. Positive regulator of JA-responsive defense genes and resistance to F. oxysporum and enhances JA inhibition of root elongation.

A. thaliana target: AT2G44840, ERF13, encodes a member of the ERF (ethylene response factor) subfamily B-3 of ERF/AP2 transcription factor family. The protein contains one AP2 domain. There are 18 members in this subfamily including ATERF-1, ATERF-2, AND ATERF-5. The mRNA is cell-to-cell mobile.

OG0000740



A. thaliana target: AT1G32928, Avr9/Cf-9 rapidly elicited protein;(source:Araport11)

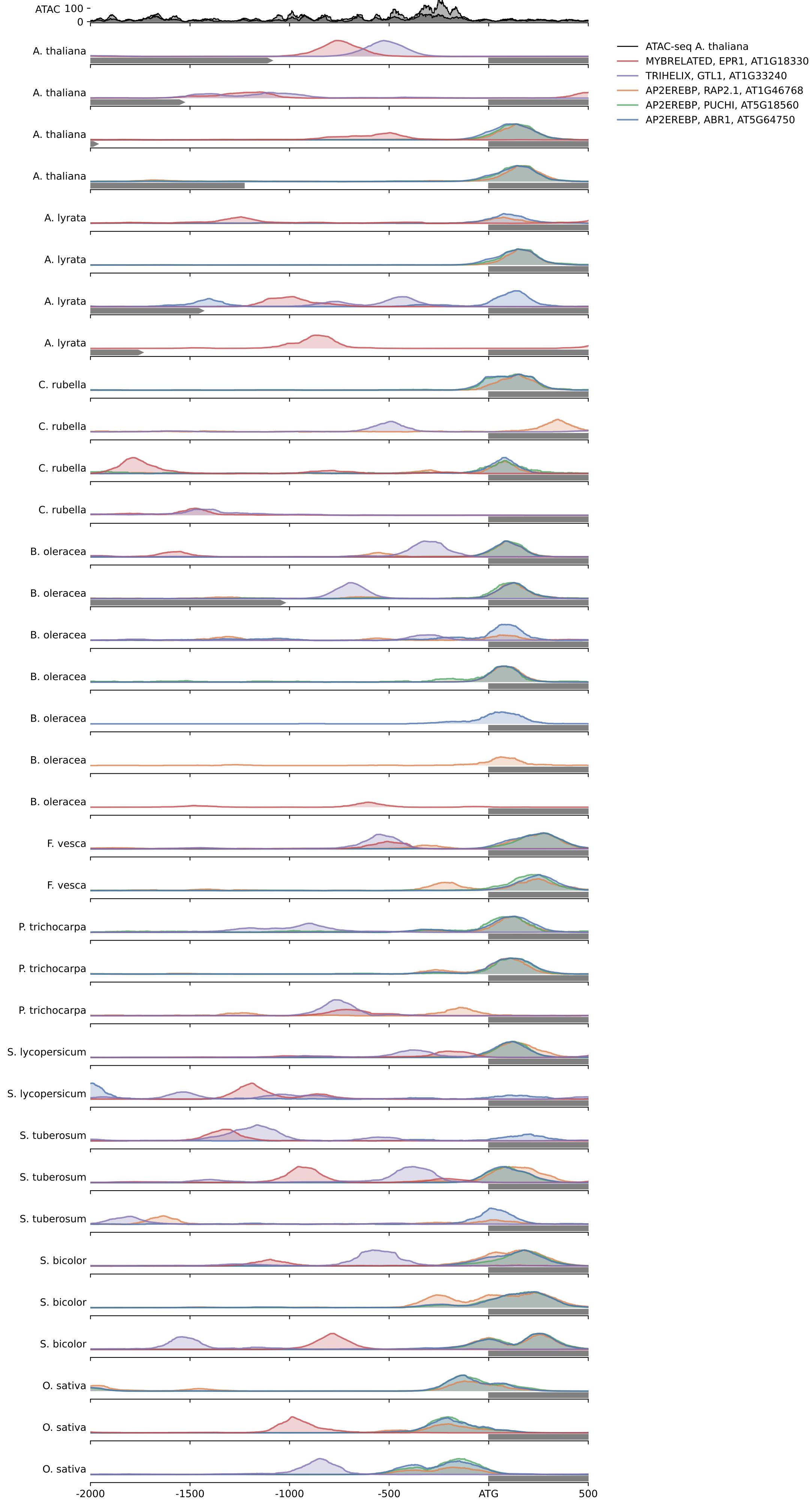


A. thaliana target: AT4G17750, HSF1, native protein is a trimer, interacts with HSP70, also with TBP, DNA interaction is modulated by phosphorylation and is heat-shock inducible

A. thaliana target: AT1G32330, HSFA1D, Member of Heat Stress Transcription Factor (Hsf) family. Negatively regulated by HSP90.2.

A. thaliana target: AT5G16820, HSF3, Encodes a putative transcription factor whose expression is not induced by heat but whose stable overexpression leads to expression of HSP. Required early in the stress response for transient expression of heat shock genes.

OG00000750



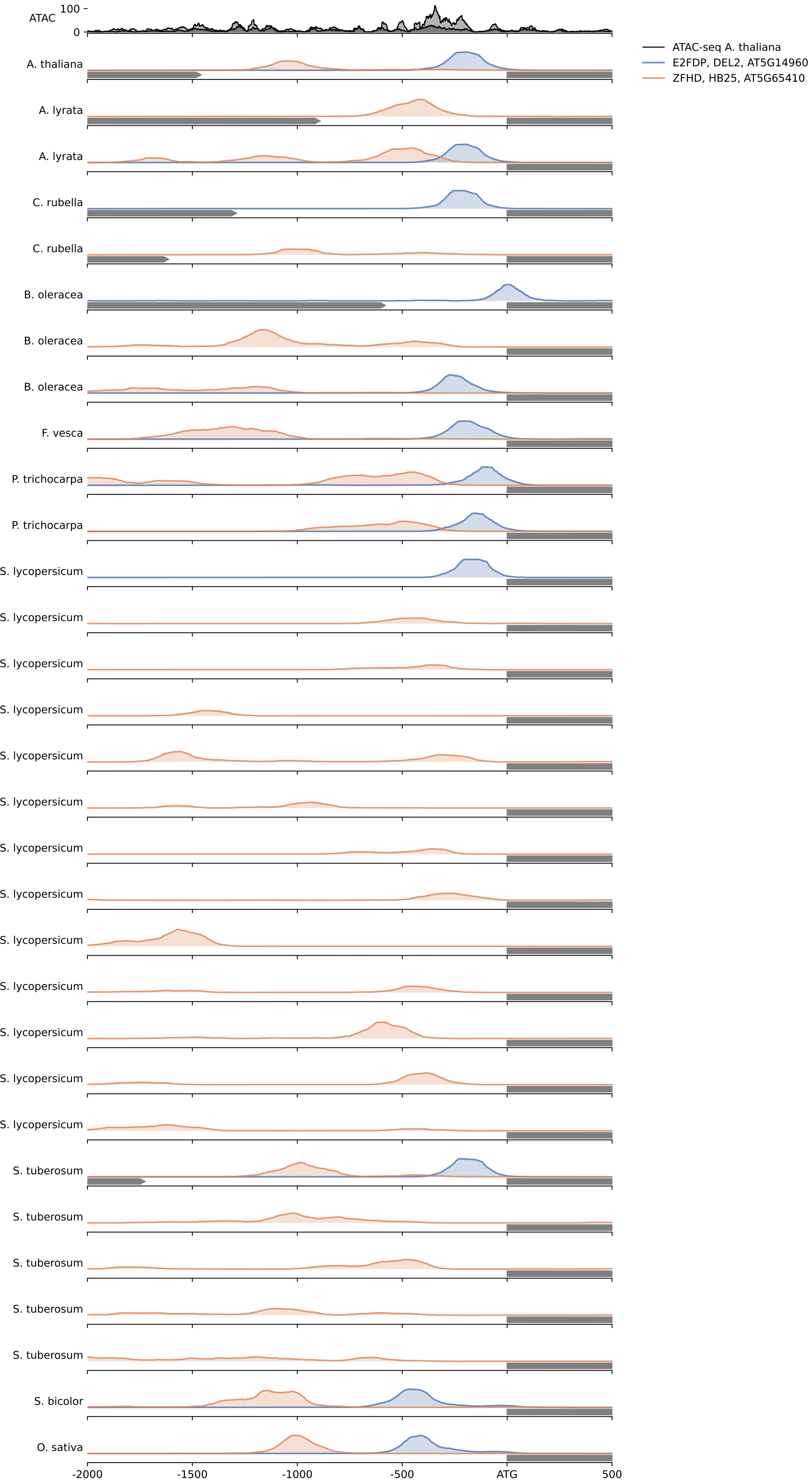
A. thaliana target: AT3G19130, RBP47B, RBP47B, is a component of the stress granule proteome and interacts with 2',3'-cAMP.

A. thaliana target: AT1G49600, RBP47A, RNA-binding protein 47A;(source:Araport11)

A. thaliana target: AT1G47490, RBP47C, RNA-binding protein 47C;(source:Araport11)

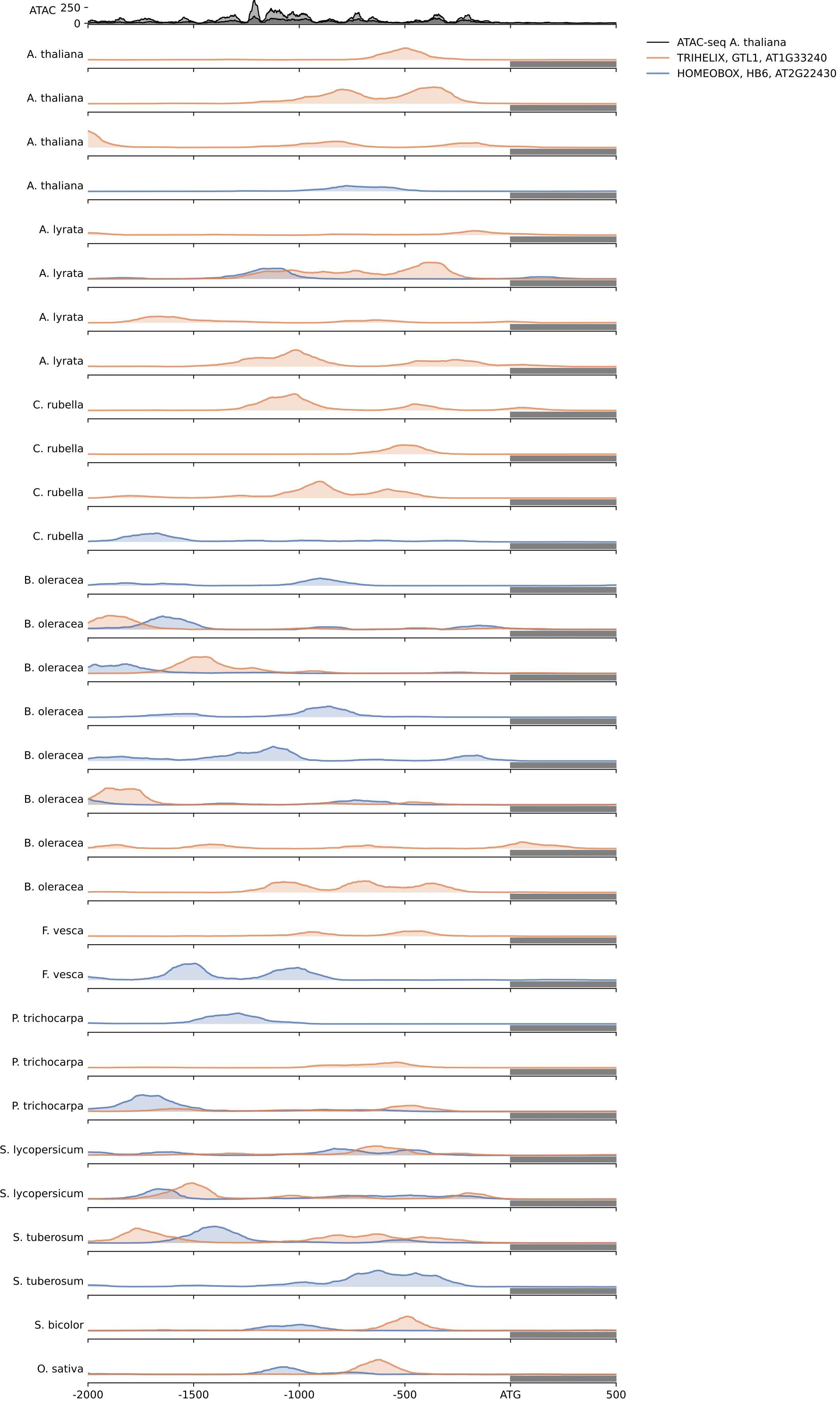
A. thaliana target: AT1G47500, RBP47C', RNA-binding protein 47C;(source:Araport11)

OG0000754



A. thaliana target: AT5G46740, UBP21, Encodes a ubiquitin-specific protease.

OG0000755



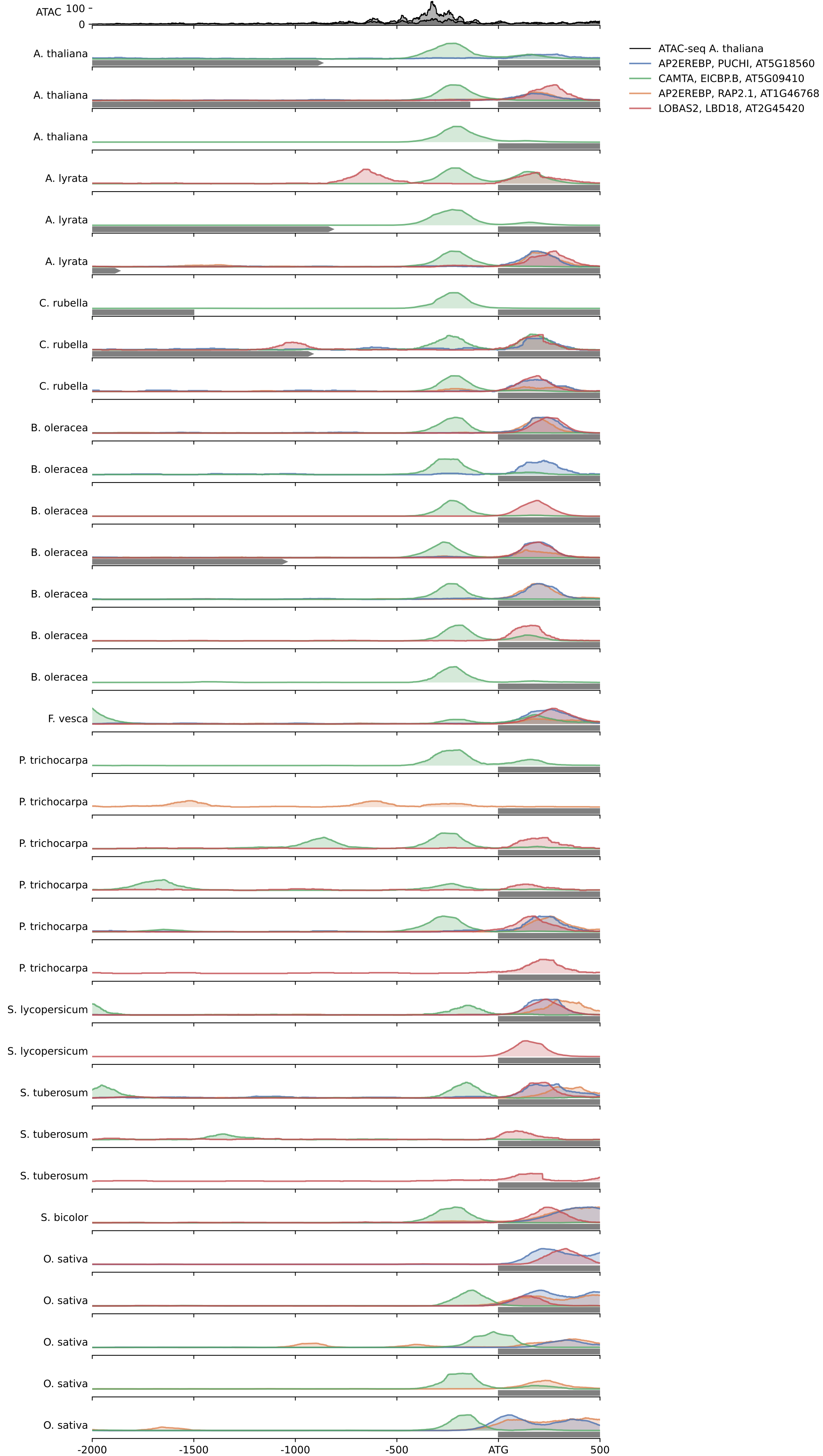
A. thaliana target: AT3G12920, BRG3, Encodes one of the BRGs (BOI-related gene) involved in resistance to *Botrytis cinerea*.

A. thaliana target: AT1G79110, BRG2, Encodes one of the BRGs (BOI-related gene) involved in resistance to *Botrytis cinerea*.

A. thaliana target: AT4G19700, RING, Encodes BOI (Botrytis Susceptible 1 Interactor). Has E3 ubiquitin ligase activity. Interacts with and ubiquitinates BOS1 (Botrytis Susceptible 1). It prevents caspase activation and attenuates cell death.

A. thaliana target: AT2G12290, hypothetical protein;(source:Araport11)

OG00000806

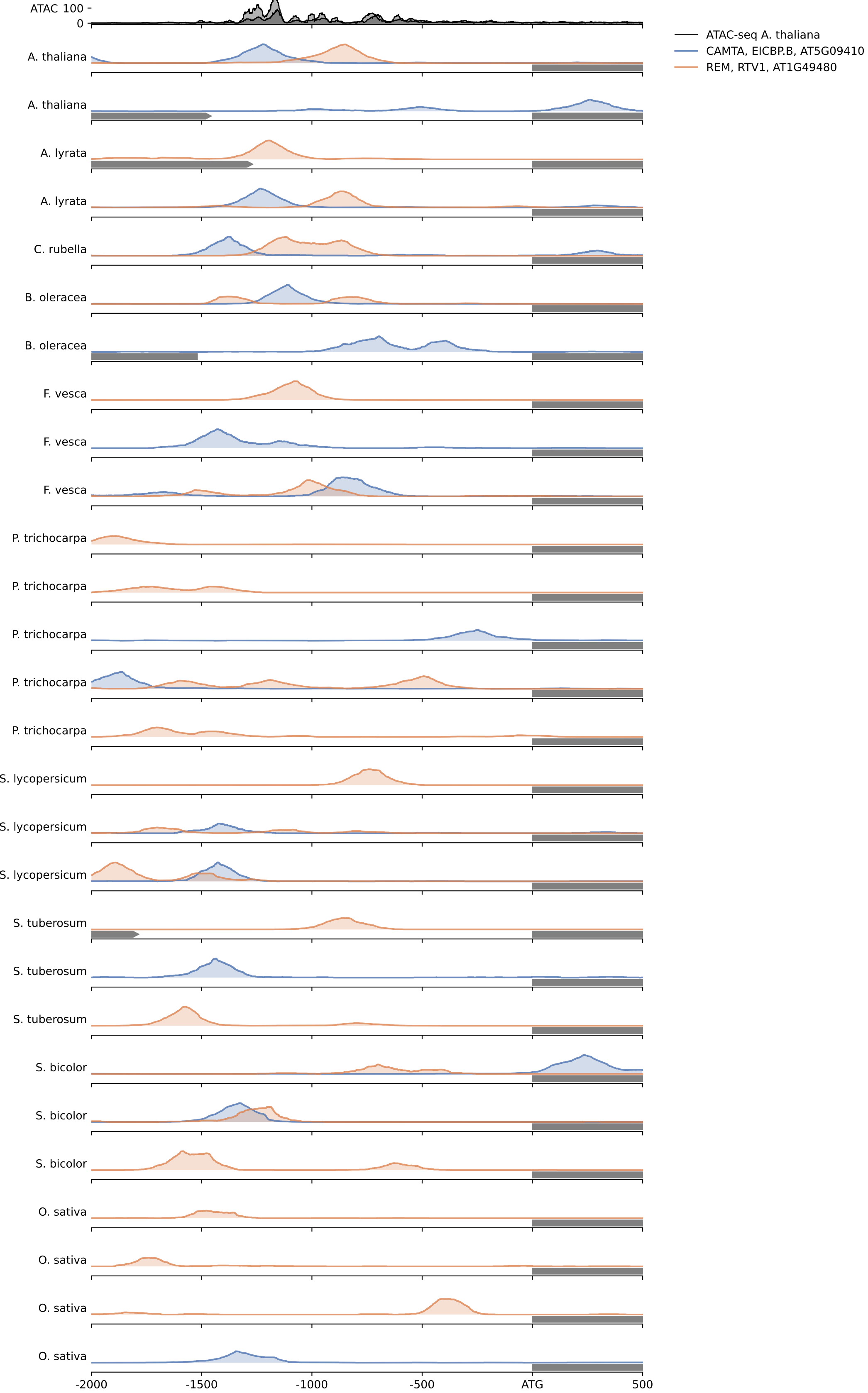


A. thaliana target: AT1G19210, encodes a member of the DREB subfamily A-5 of ERF/AP2 transcription factor family. The protein contains one AP2 domain. There are 15 members in this subfamily including RAP2.1, RAP2.9 and RAP2.10.

A. thaliana target: AT1G74930, ORA47, encodes a member of the DREB subfamily A-5 of ERF/AP2 transcription factor family. The protein contains one AP2 domain. There are 15 members in this subfamily including RAP2.1, RAP2.9 and RAP2.10. The mRNA is cell-to-cell mobile.

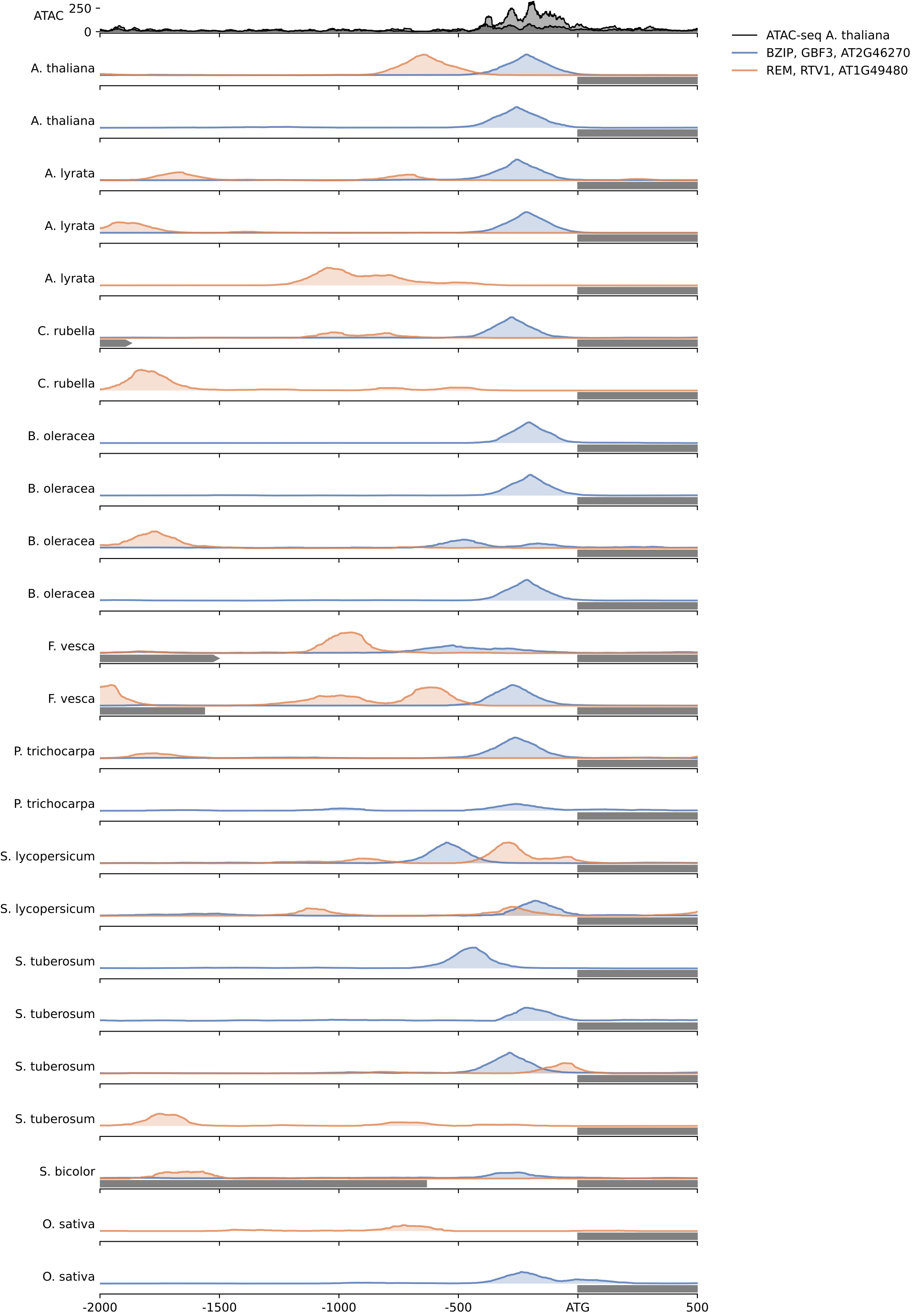
A. thaliana target: AT5G21960, encodes a member of the DREB subfamily A-5 of ERF/AP2 transcription factor family. The protein contains one AP2 domain. There are 15 members in this subfamily including RAP2.1, RAP2.9 and RAP2.10.

OG0000811



A. thaliana target: AT1G26850, S-adenosyl-L-methionine-dependent methyltransferases superfamily protein;(source:Araport11)

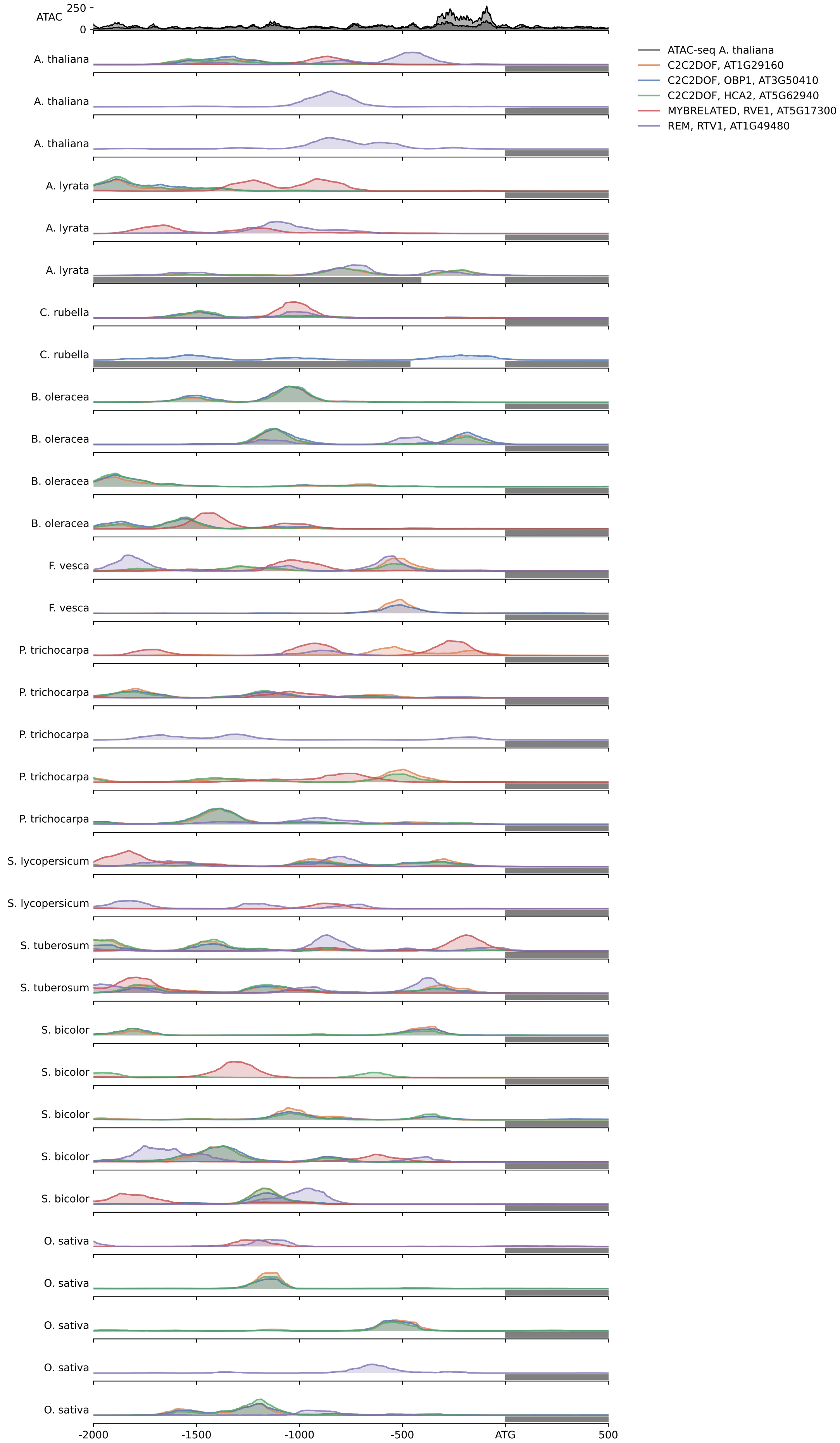
A. thaliana target: AT4G18030, S-adenosyl-L-methionine-dependent methyltransferases superfamily protein;(source:Araport11)



A. thaliana target: AT5G38410, RBCS3B, Encodes a member of the Rubisco small subunit (RBCS) multigene family: RBCS1A (At1g67090), RBCS1B (At5g38430), RBCS2B (At5g38420), and RBCS3B (At5g38410). Functions to yield sufficient Rubisco content for leaf photosynthetic capacity.

A. thaliana target: AT1G67090, RBCS1A, Encodes a member of the Rubisco small subunit (RBCS) multigene family: RBCS1A (At1g67090), RBCS1B (At5g38430), RBCS2B (At5g38420), and RBCS3B (At5g38410). Functions to yield sufficient Rubisco content for leaf photosynthetic capacity.

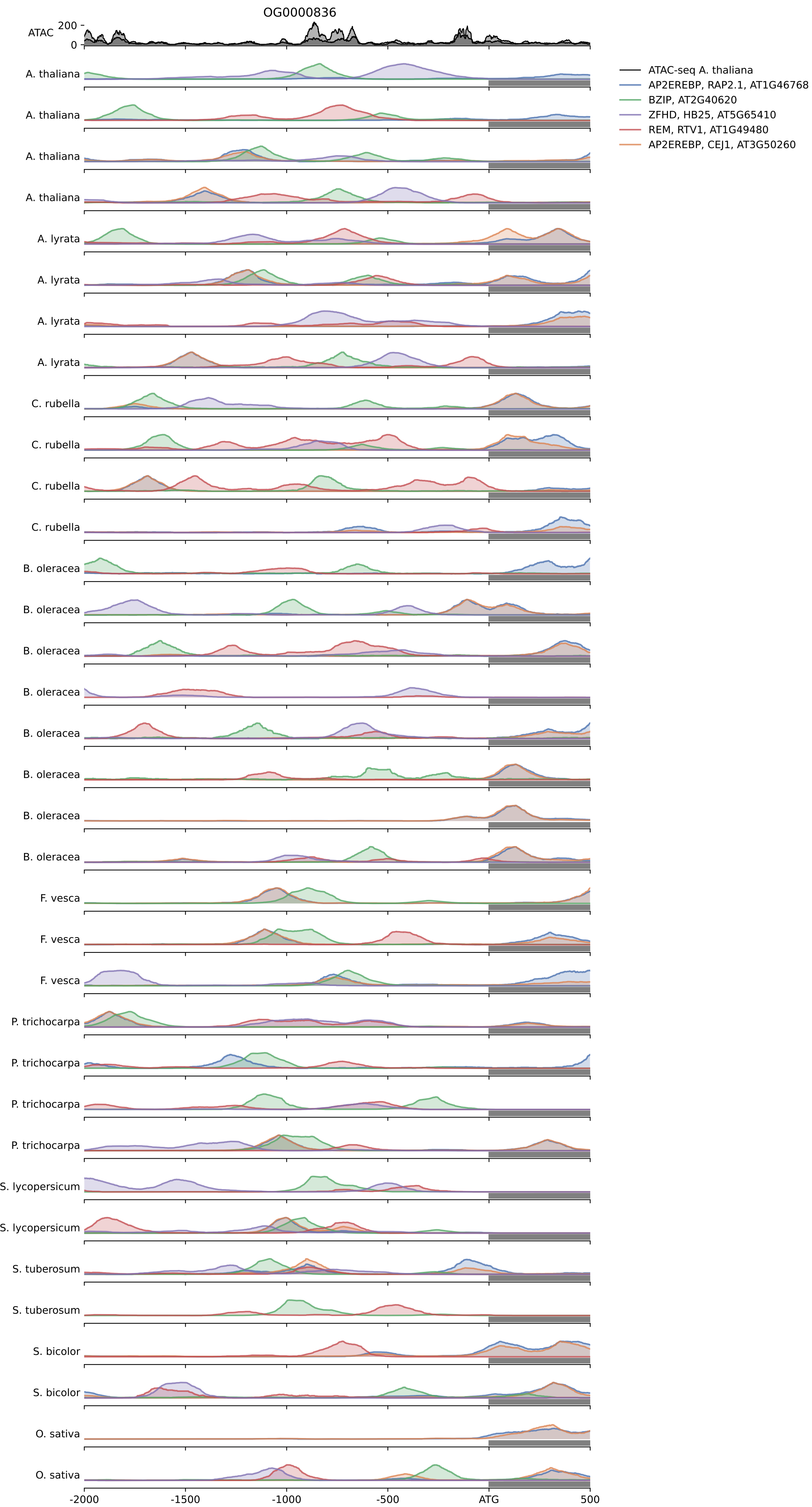
OG0000828



A. thaliana target: AT4G00150, HAM3, Belongs to one of the LOM (LOST MERISTEMS) genes: AT2G45160 (LOM1), AT3G60630 (LOM2) and AT4G00150 (LOM3). LOM1 and LOM2 promote cell differentiation at the periphery of shoot meristems and help to maintain their polar organization.

A. thaliana target: AT2G45160, HAM1, Belongs to one of the LOM (LOST MERISTEMS) genes: AT2G45160 (LOM1), AT3G60630 (LOM2) and AT4G00150 (LOM3). LOM1 and LOM2 promote cell differentiation at the periphery of shoot meristems and help to maintain their polar organization.

A. thaliana target: AT3G60630, HAM2, Belongs to one of the LOM (LOST MERISTEMS) genes: AT2G45160 (LOM1), AT3G60630 (LOM2) and AT4G00150 (LOM3). LOM1 and LOM2 promote cell differentiation at the periphery of shoot meristems and help to maintain their polar organization.

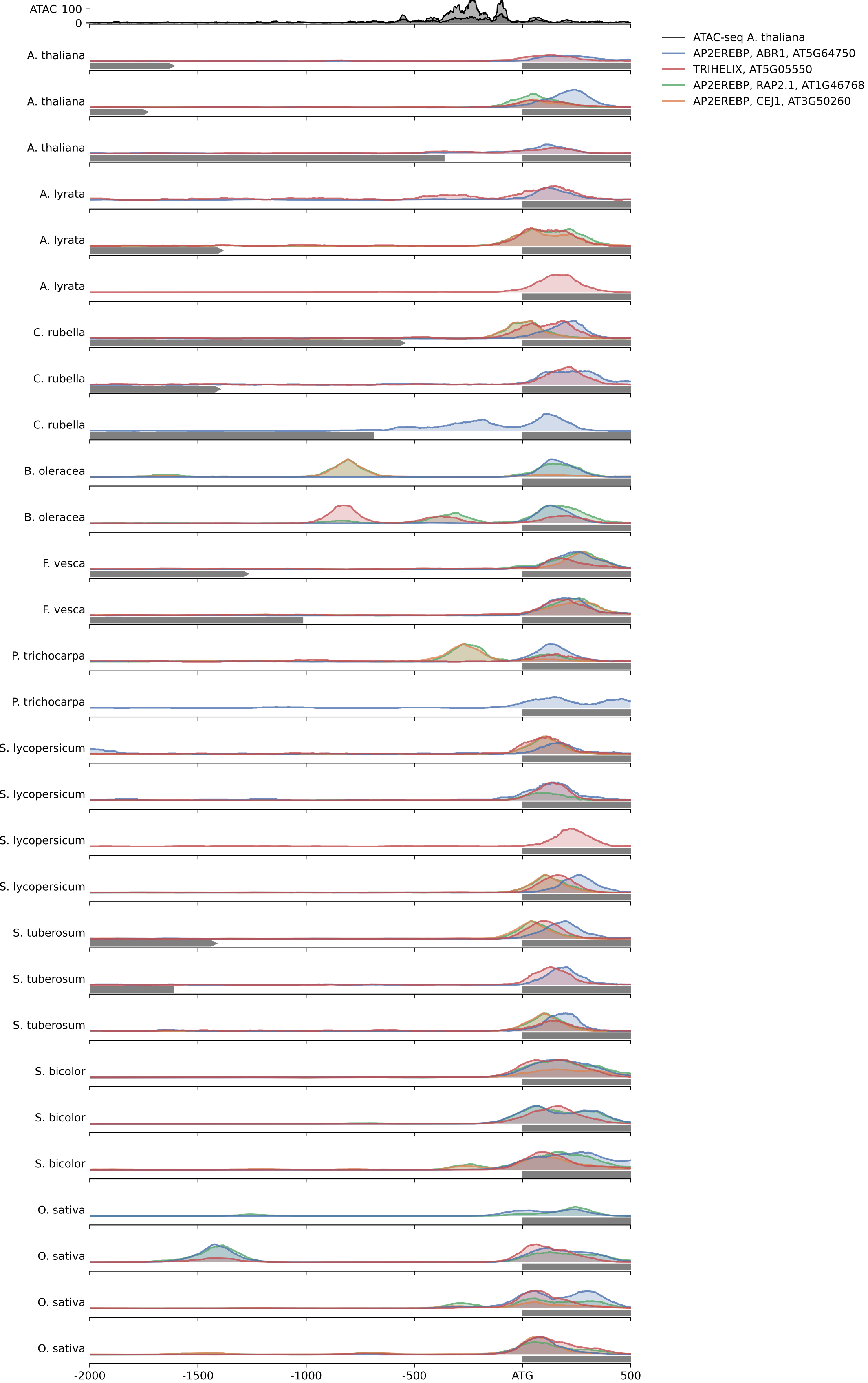


A. thaliana target: AT2G23290, MYB70, Member of the R2R3 factor gene family. Modulates seed germination and root system development.

A. thaliana target: AT3G50060, MYB77, Encodes a member of the R2R3 transcription factor gene family. Expressed in response to potassium deprivation and auxin. Involved in lateral root development. Interacts with ARF7 and regulates the expression of some auxin responsive genes.

A. thaliana target: AT5G67300, MYBR1, Member of the R2R3 factor MYB gene family involved in mediating plant responses to a variety of abiotic stimuli. The mRNA is cell-to-cell mobile.

A. thaliana target: AT4G37260, MYB73, Member of the R2R3 factor gene family. The mRNA is cell-to-cell mobile.

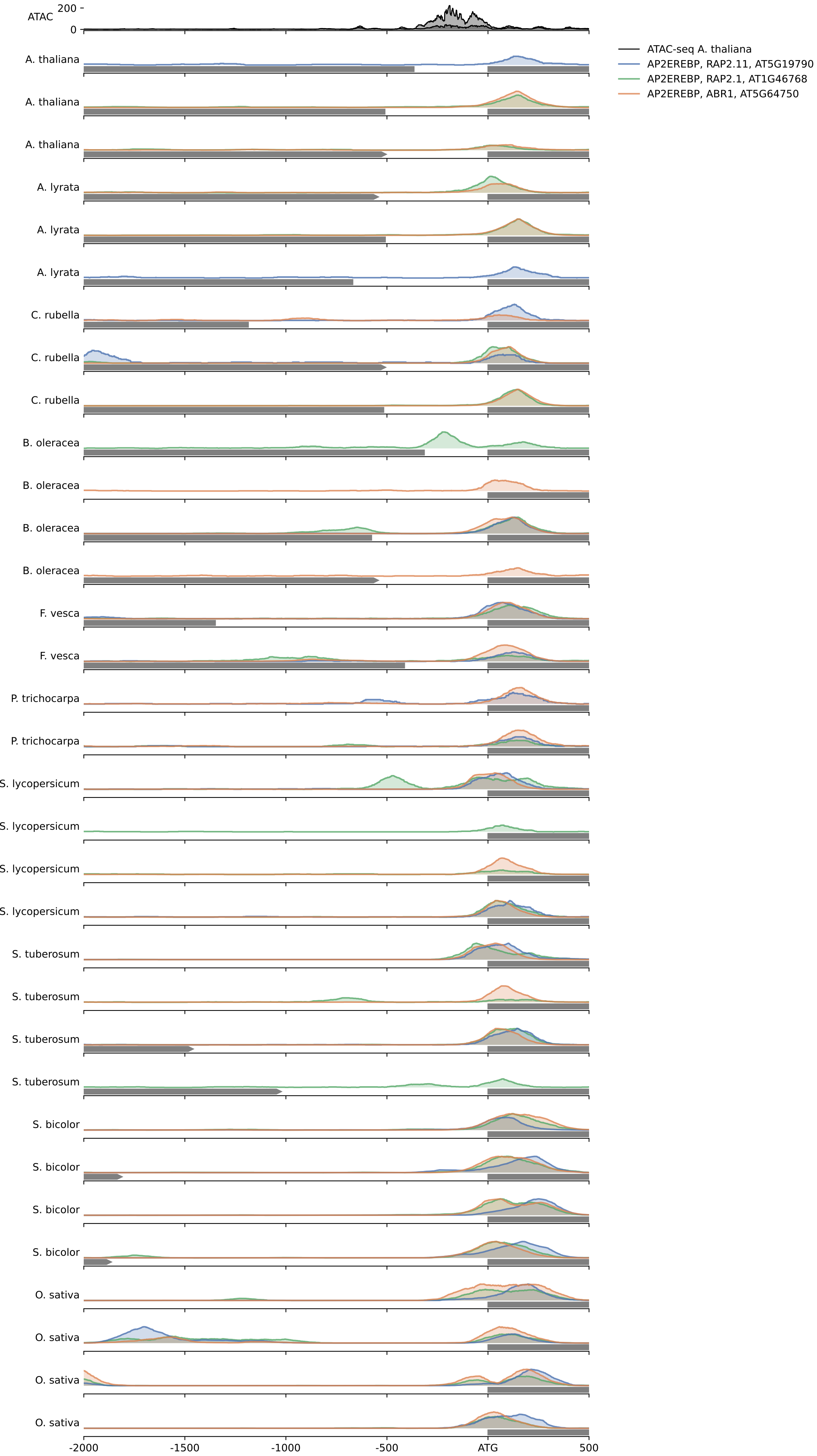


A. thaliana target: AT4G27320, PHOS34, Contains a universal stress protein domain. Protein is phosphorylated in response to *Phytophthora infestans* zoospores and xylanase.

A. thaliana target: AT1G11360, Adenine nucleotide alpha hydrolases-like superfamily protein;(source:Araport11)

A. thaliana target: AT5G54430, PHOS32, Contains a universal stress protein domain. Protein is phosphorylated in response to *Phytophthora infestans* zoospores and xylanase.

OG0000867

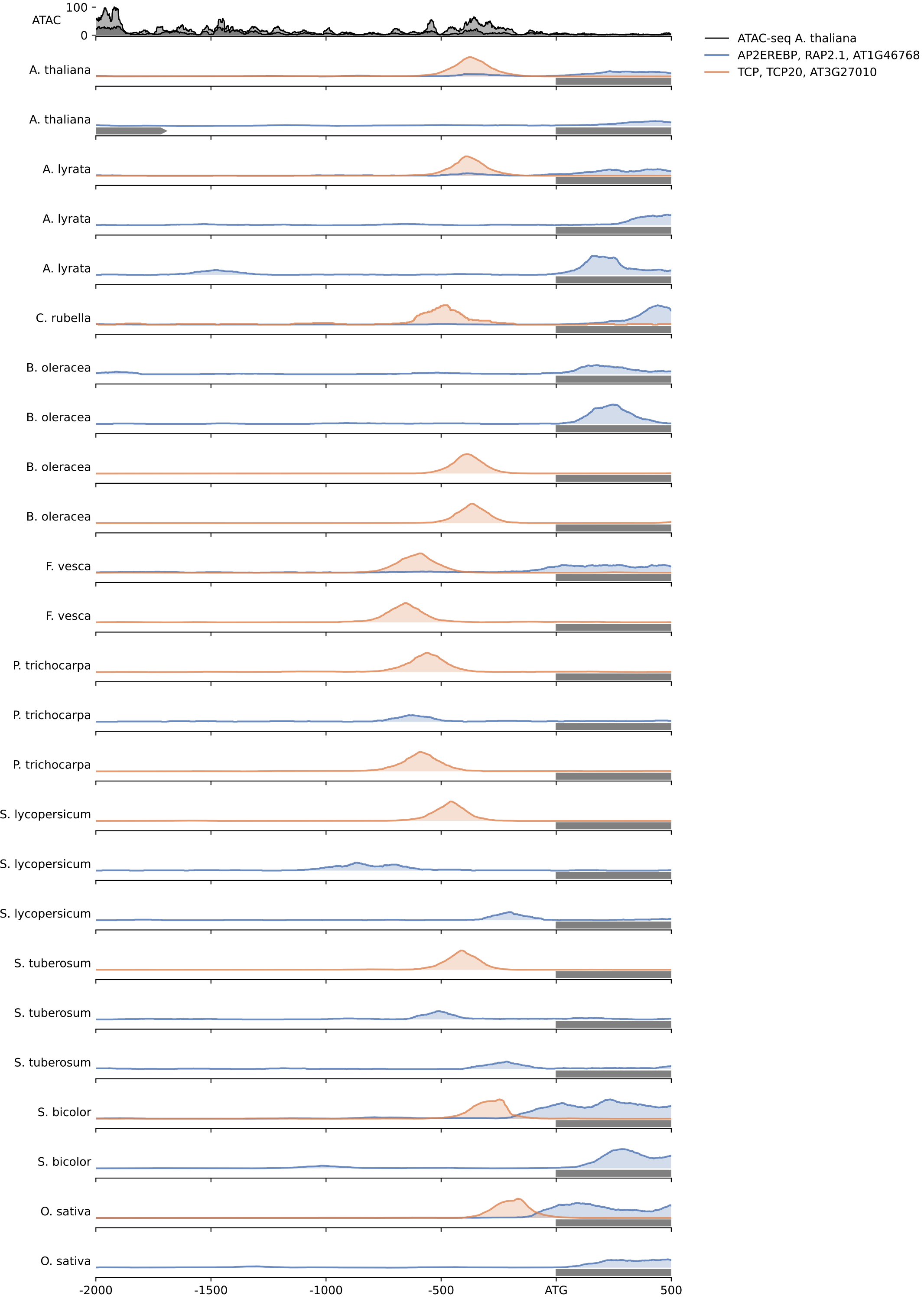


A. thaliana target: AT4G27000, ATRBP45C, RNA-binding (RRM/RBD/RNP motifs) family protein;(source:Araport11)

A. thaliana target: AT1G11650, RBP45B, Encodes an RNA binding protein with three RNA recognition motifs. The mRNA is cell-to-cell mobile.

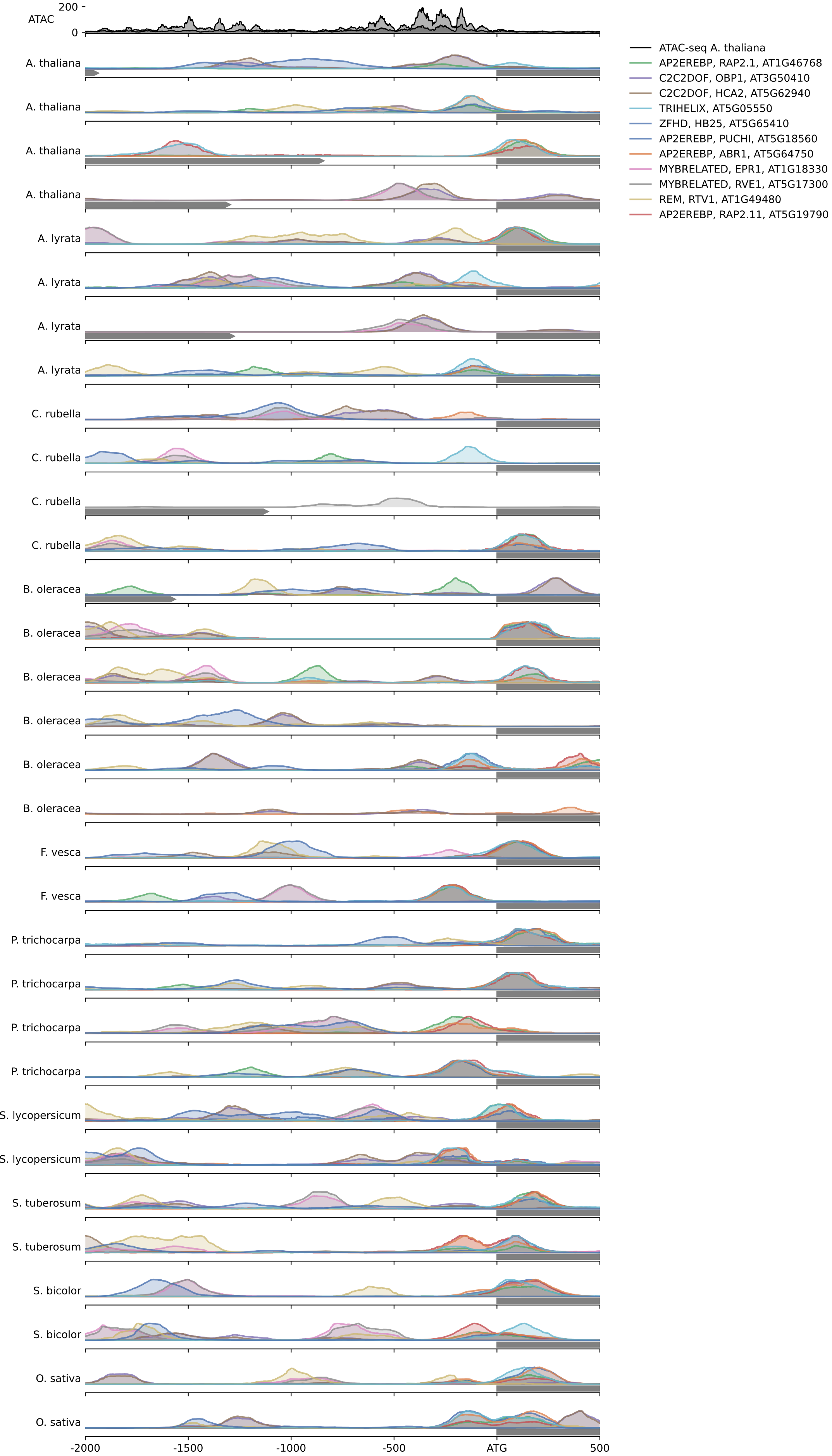
A. thaliana target: AT5G54900, RBP45A, RNA-binding protein 45A;(source:Araport11)

OG0000881



A. thaliana target: AT2G45430, AHL22, Encodes a nuclear localized AT hook domain containing protein that can bind AT rich DNA in vitro. Overexpression of the gene results in delayed flowering. Is likely to act redundantly with AHL18, AHL27 and AHL29 in the regulation of flowering. It is also involved in both photo- and skotomorphogenesis.

A. thaliana target: AT3G60870, AHL18, Encodes an AT hook domain containing protein that, when overexpressed, delays flowering. Loss of function mutations have defects in primary and lateral root development.



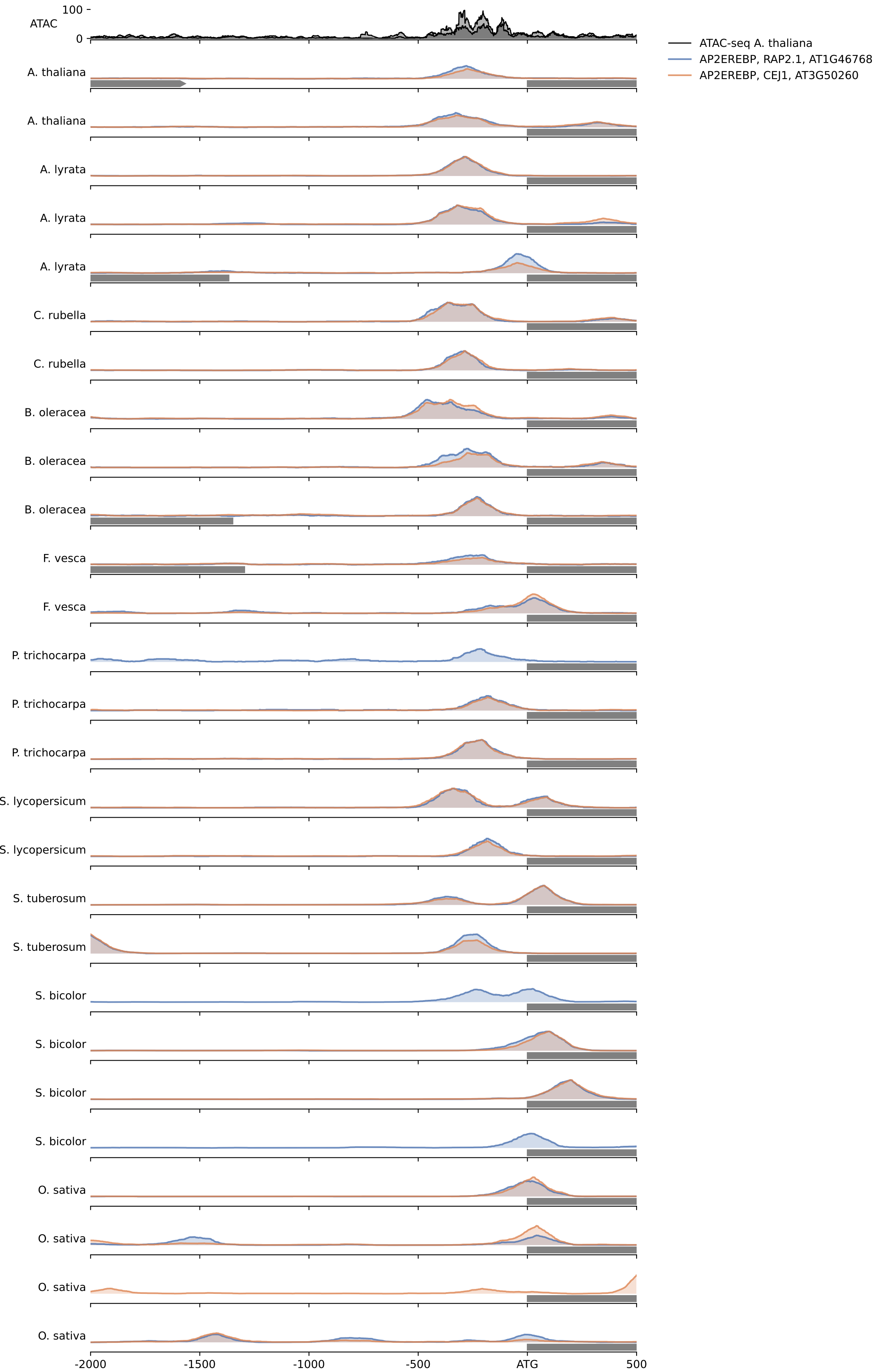
A. thaliana target: AT5G53570, Ypt/Rab-GAP domain of gyp1p superfamily protein;(source:Araport11)

A. thaliana target: AT3G49350, Ypt/Rab-GAP domain of gyp1p superfamily protein;(source:Araport11)

A. thaliana target: AT5G41940, Ypt/Rab-GAP domain of gyp1p superfamily protein;(source:Araport11)

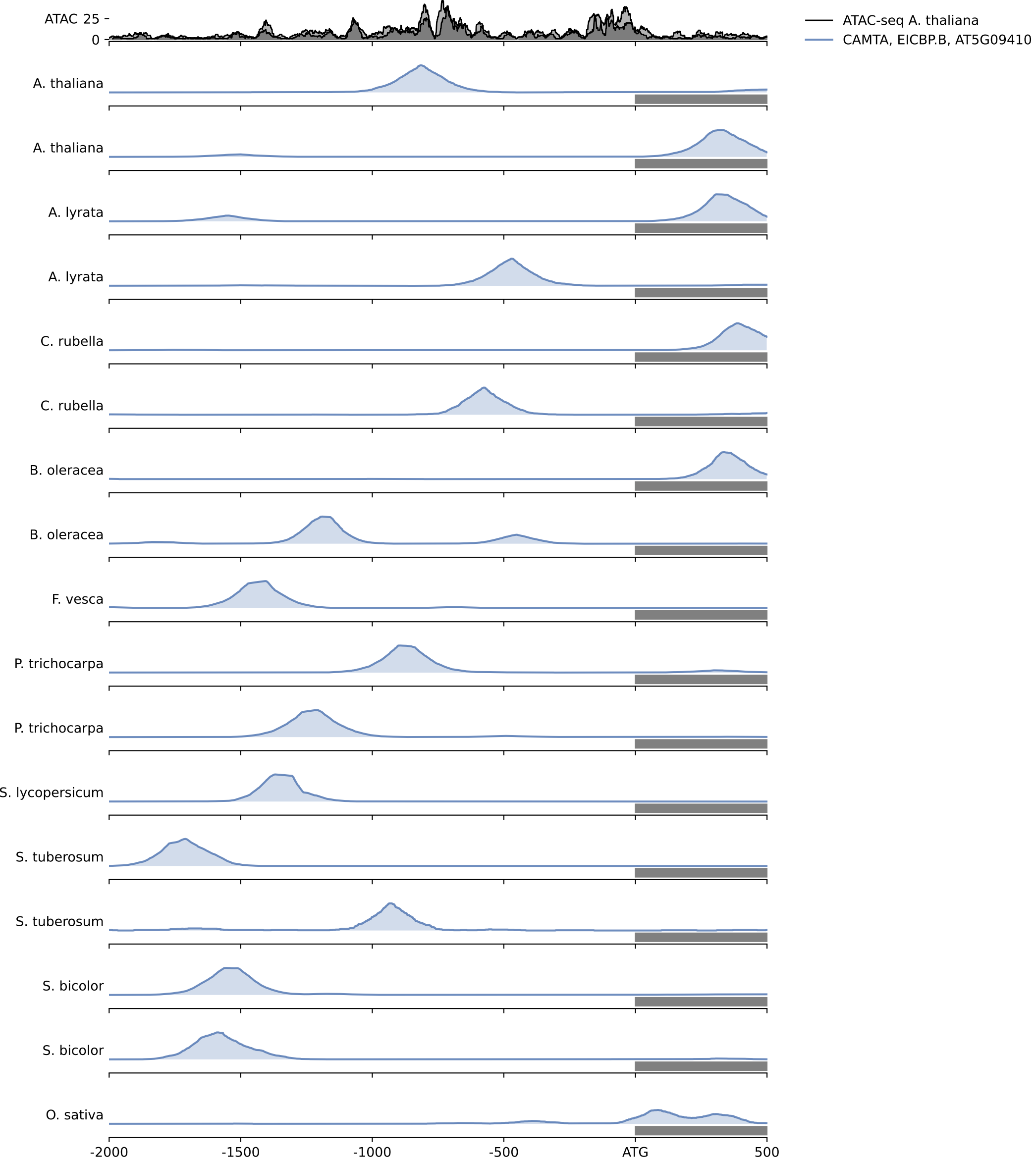
A. thaliana target: AT5G24390, Ypt/Rab-GAP domain of gyp1p superfamily protein;(source:Araport11)

OG0000921



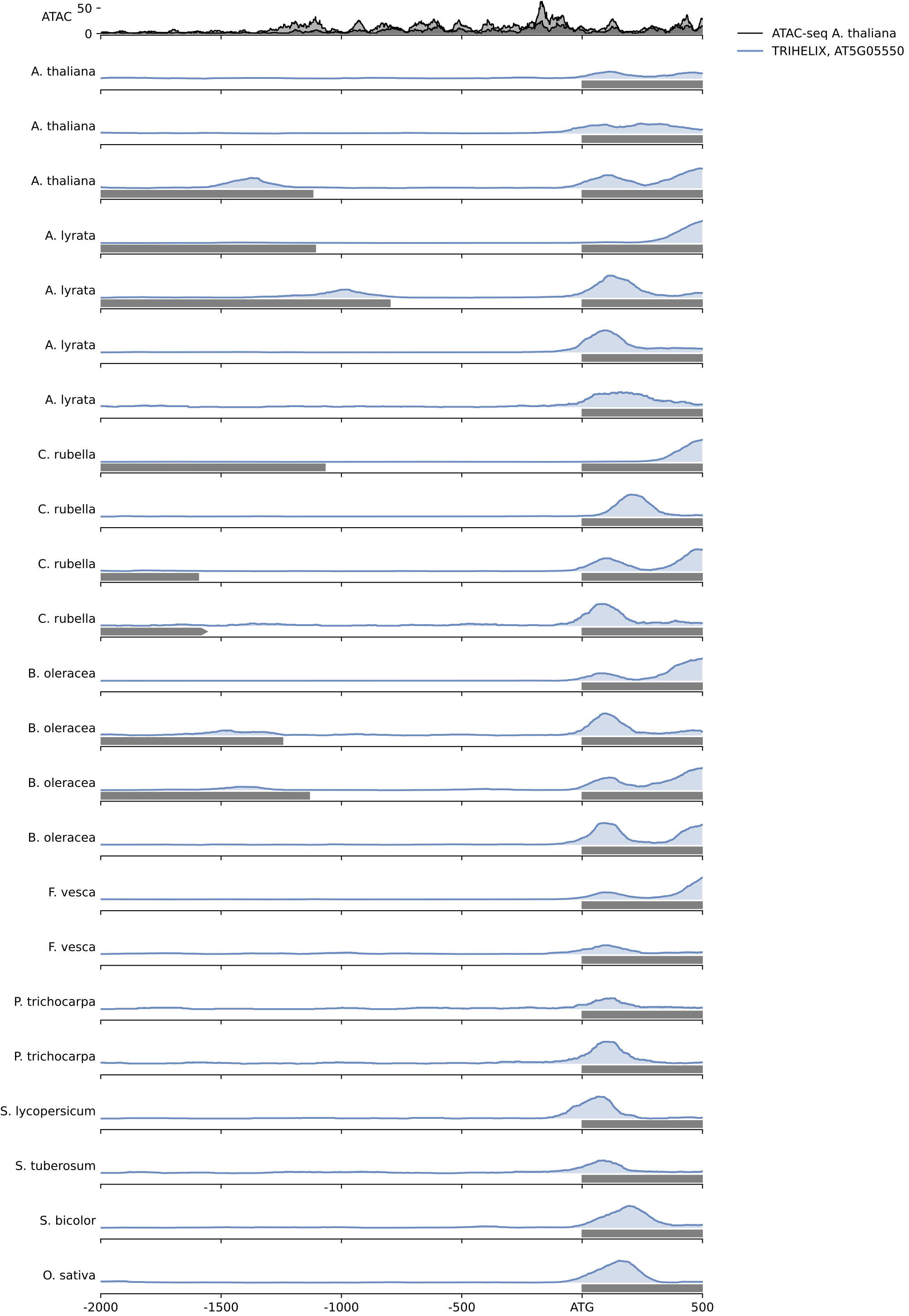
A. thaliana target: AT2G19620, NDL3, Plays a role in dehydration stress response.

A. thaliana target: AT5G11790, NDL2, Plays a role in dehydration stress response.



A. thaliana target: AT1G70370, PG2, Polygalacturonase involved in cell wall modification.

A. thaliana target: AT1G60390, PG1, polygalacturonase 1;(source:Araport11)

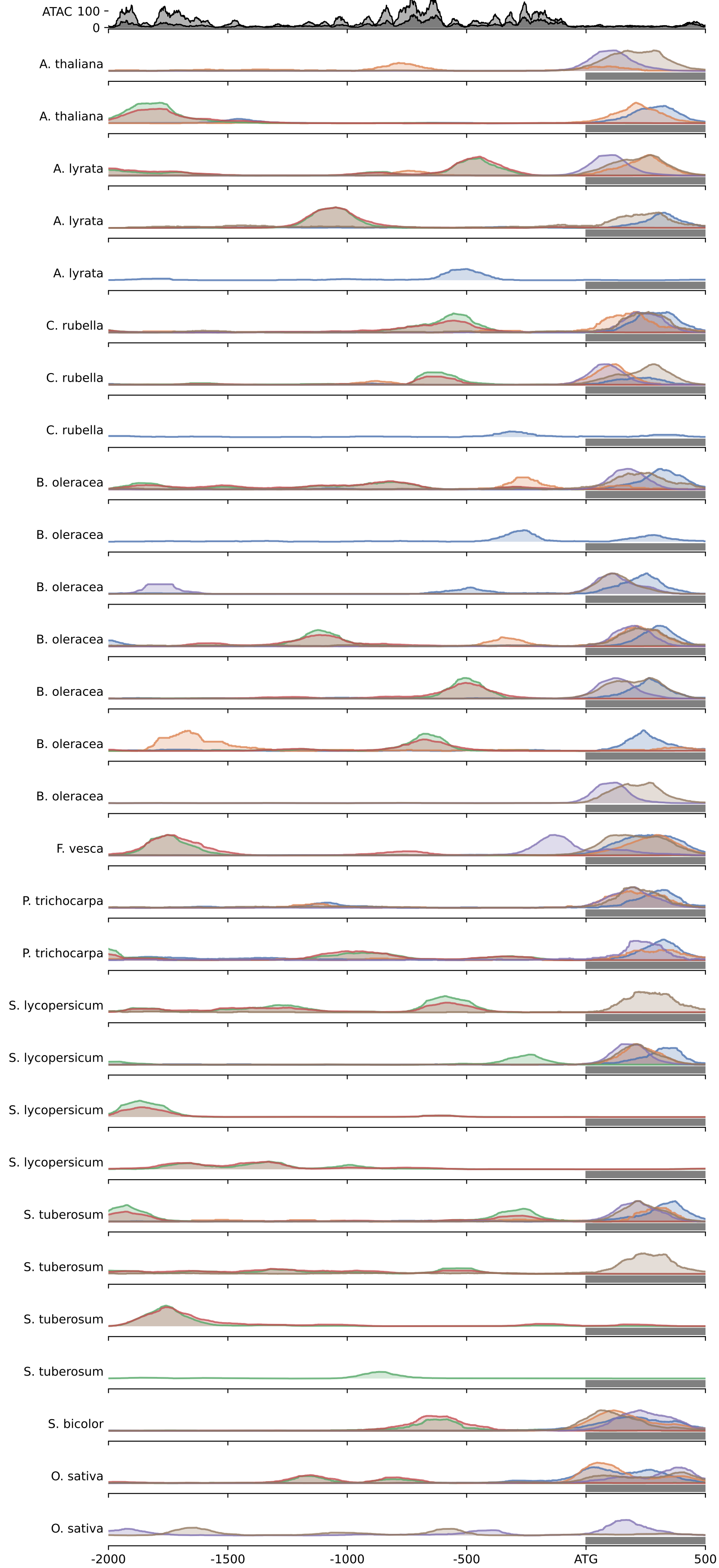


A. thaliana target: AT3G48240, Octicosapeptide/Phox/Bem1p family protein;(source:Araport11)

A. thaliana target: AT3G26510, Octicosapeptide/Phox/Bem1p family protein;(source:Araport11)

A. thaliana target: AT5G63130, Octicosapeptide/Phox/Bem1p family protein;(source:Araport11)

OG0000986

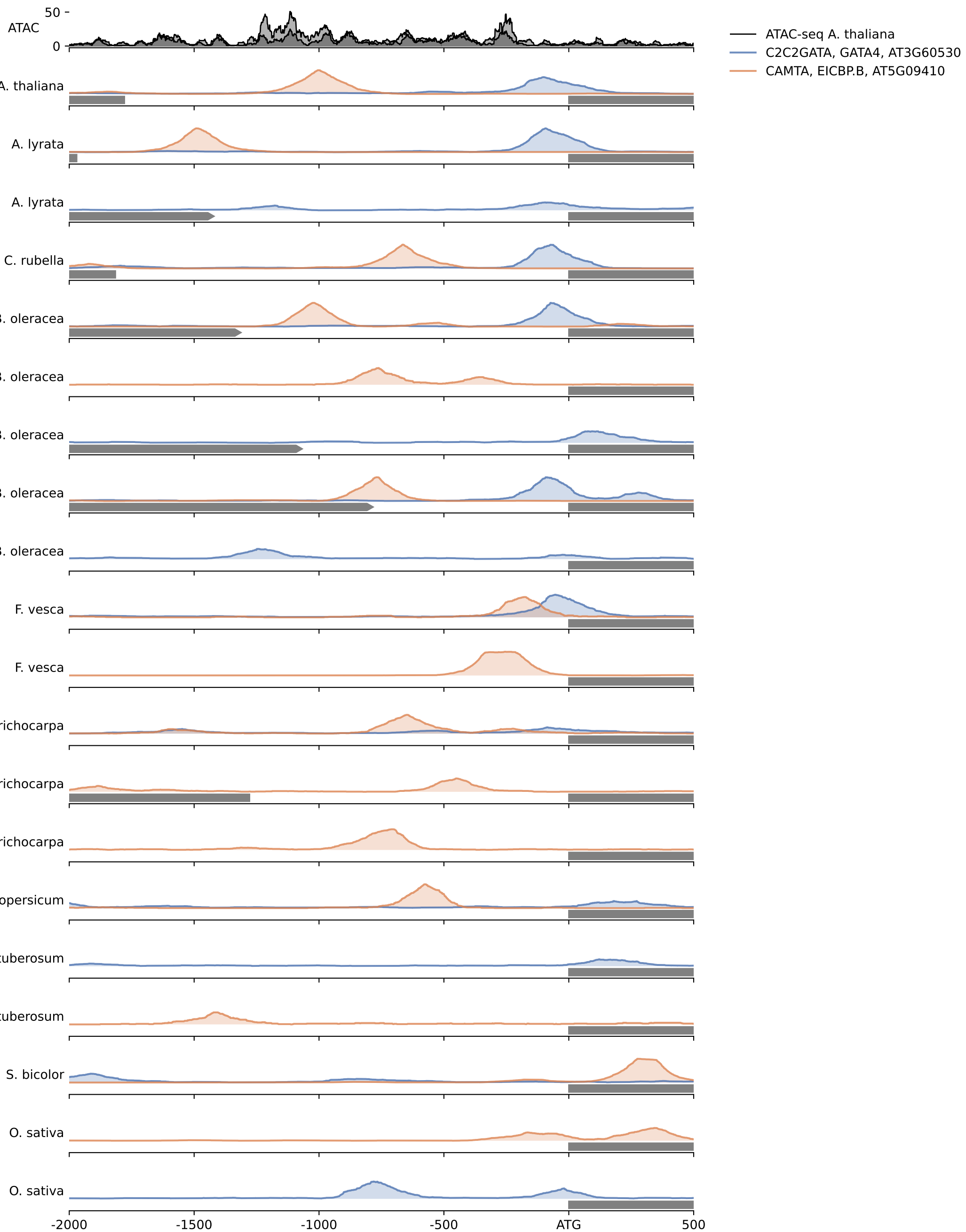


- ATAC-seq *A. thaliana*
- AP2EREBP, RAP2.11, AT5G19790
- LOBAS2, LBD18, AT2G45420
- TRIHELIX, AT5G05550
- AP2EREBP, RAP2.1, AT1G46768
- HOMEBOX, ATHB13, AT1G69780
- HOMEBOX, HB6, AT2G22430

A. thaliana target: AT5G66650, Chloroplast localized mitochondrial calcium uniporter.

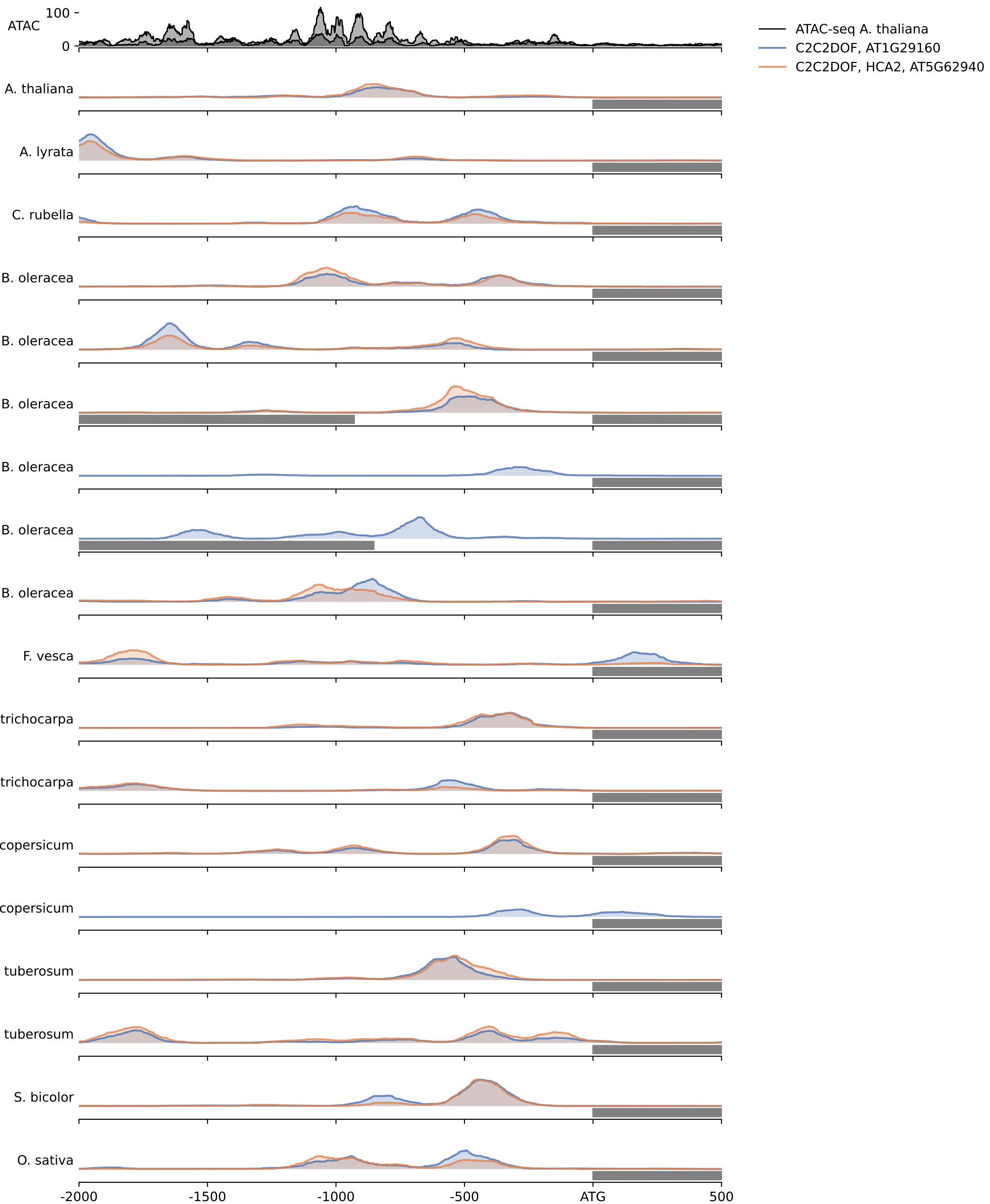
A. thaliana target: AT2G23790, Mitochondrial calcium uniporter, acts redundantly with MCU1-2 in mitochondrial Ca²⁺ uptake.

OG0000994

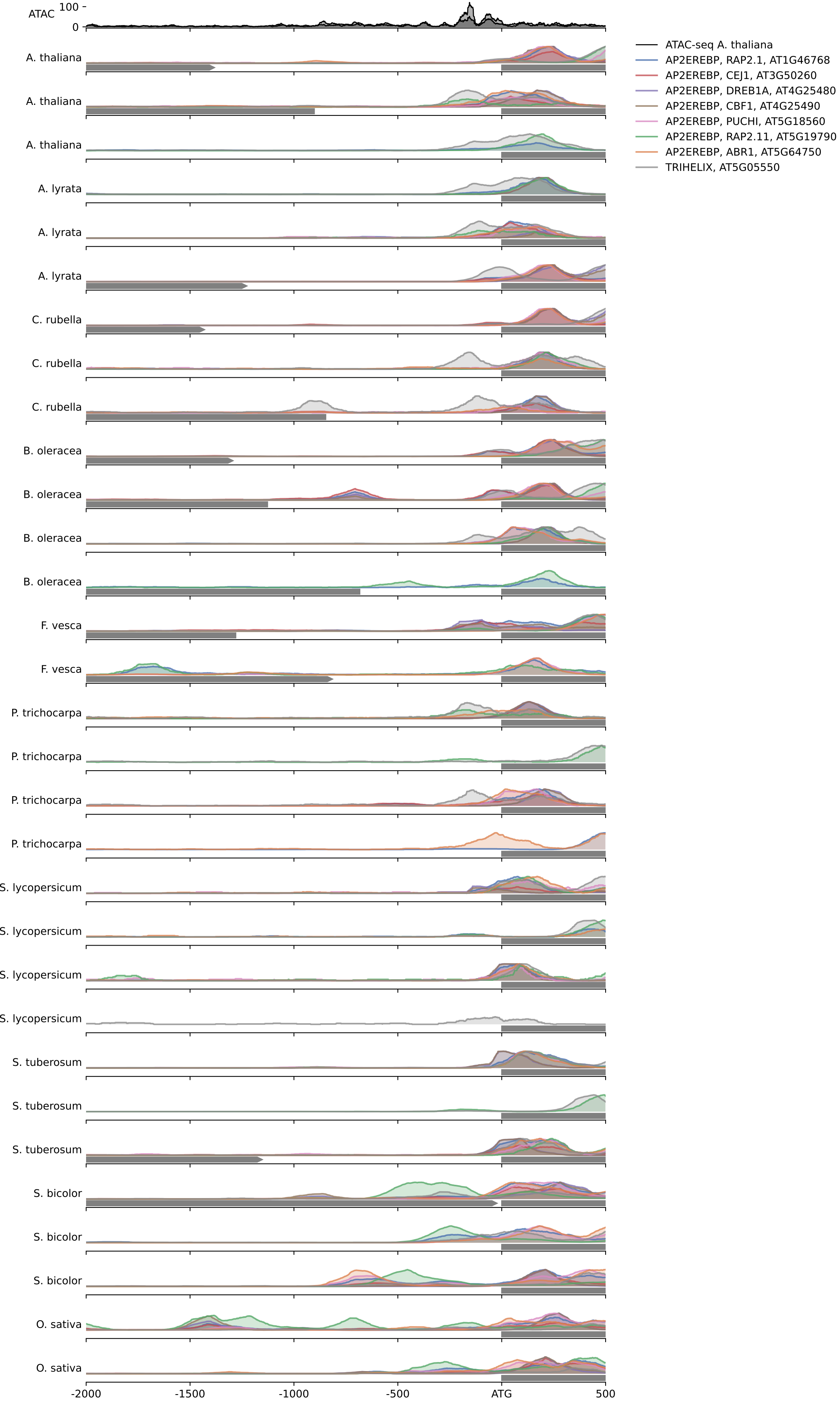


A. thaliana target: AT3G06550, RWA2, Encodes a homolog of the protein Cas1p known to be involved in polysaccharide O-acetylation in *Cryptococcus neoformans*. Mutants show reduced cell wall polysaccharide acetylation and increased resistance to *Botrytis cinerea*. The protein is expressed in the Golgi and is involved in the acetylation of xylan during secondary wall biosynthesis.

OG0001025



OG0001050

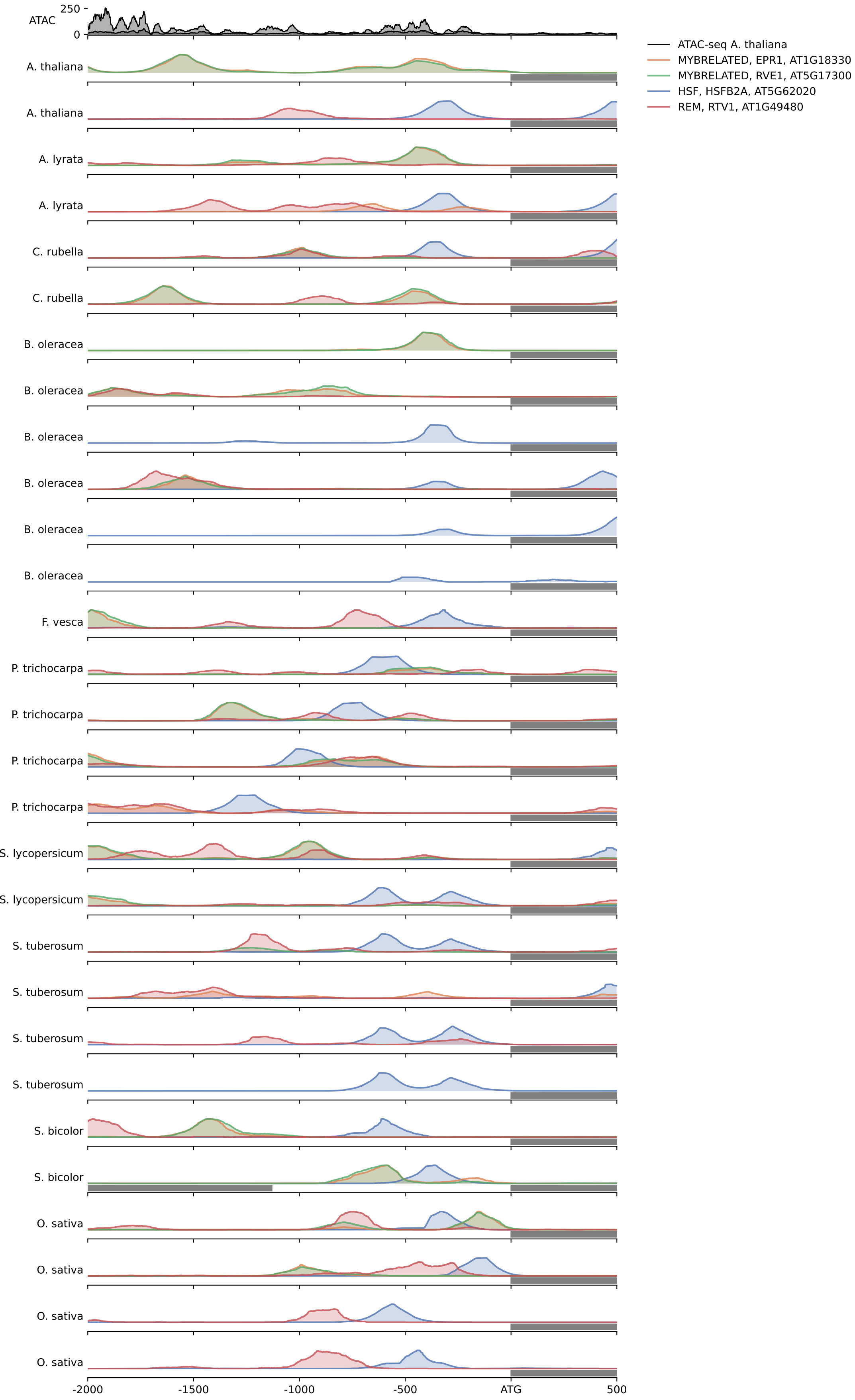


A. thaliana target: AT3G58630, sequence-specific DNA binding transcription factor;(source:Araport11)

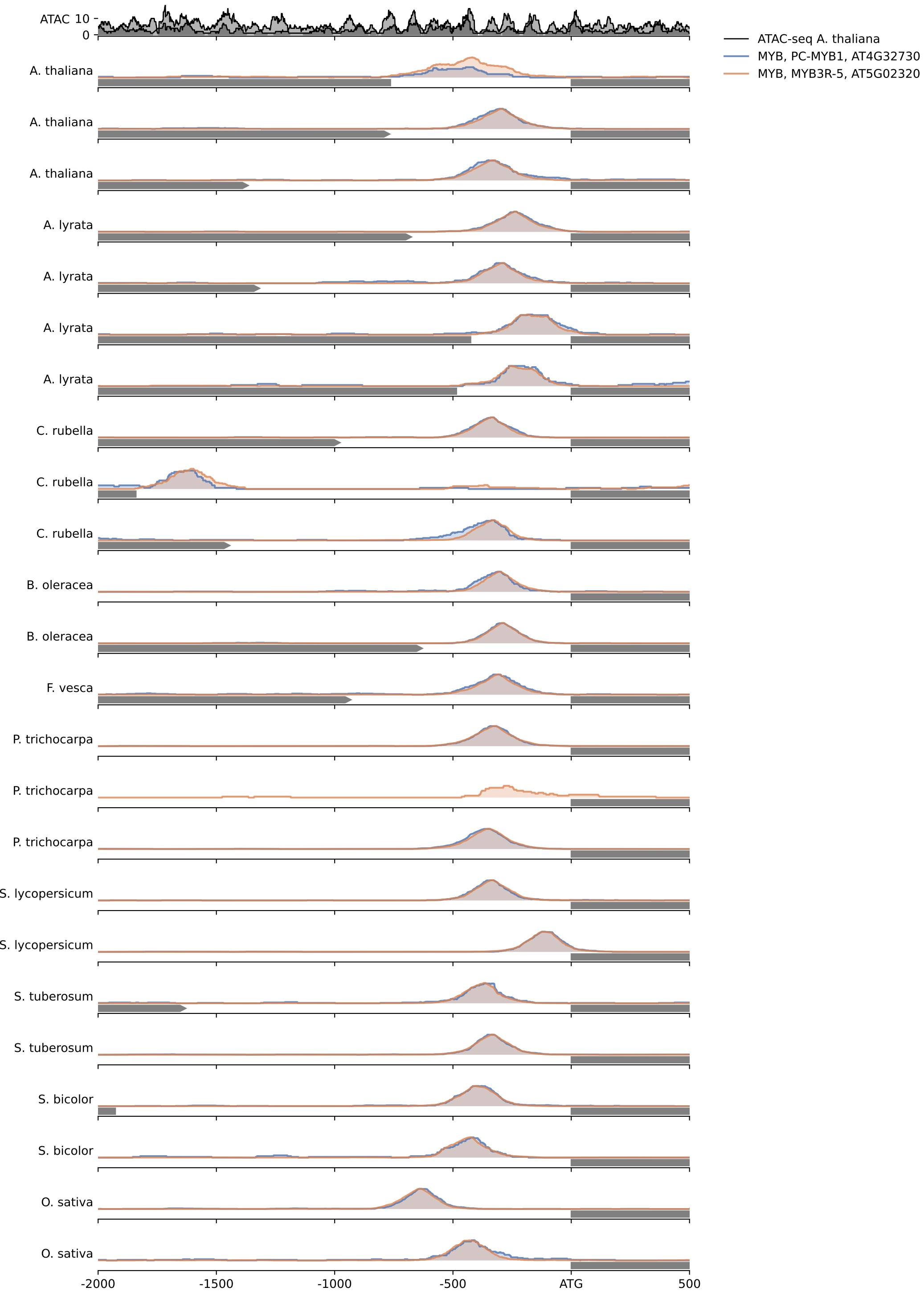
A. thaliana target: AT5G05550, Encodes trihelix-domain transcription factor VFP5. Interacts with agrobacterium virulence protein VirF.

A. thaliana target: AT3G11100, SANT and trihelix-domain protein. Interacts with agrobacterium virulence protein VirF. It also plays a role in regulation of histone acetylation during ethylene signaling. It binds EIN2 and EIN3 and histone H3.

OG0001057



A. thaliana target: AT3G22830, HSF6B, member of Heat Stress Transcription Factor (Hsf) family
A. thaliana target: AT3G51910, HSF7A, member of Heat Stress Transcription Factor (Hsf) family The mRNA is cell-to-cell mobile.

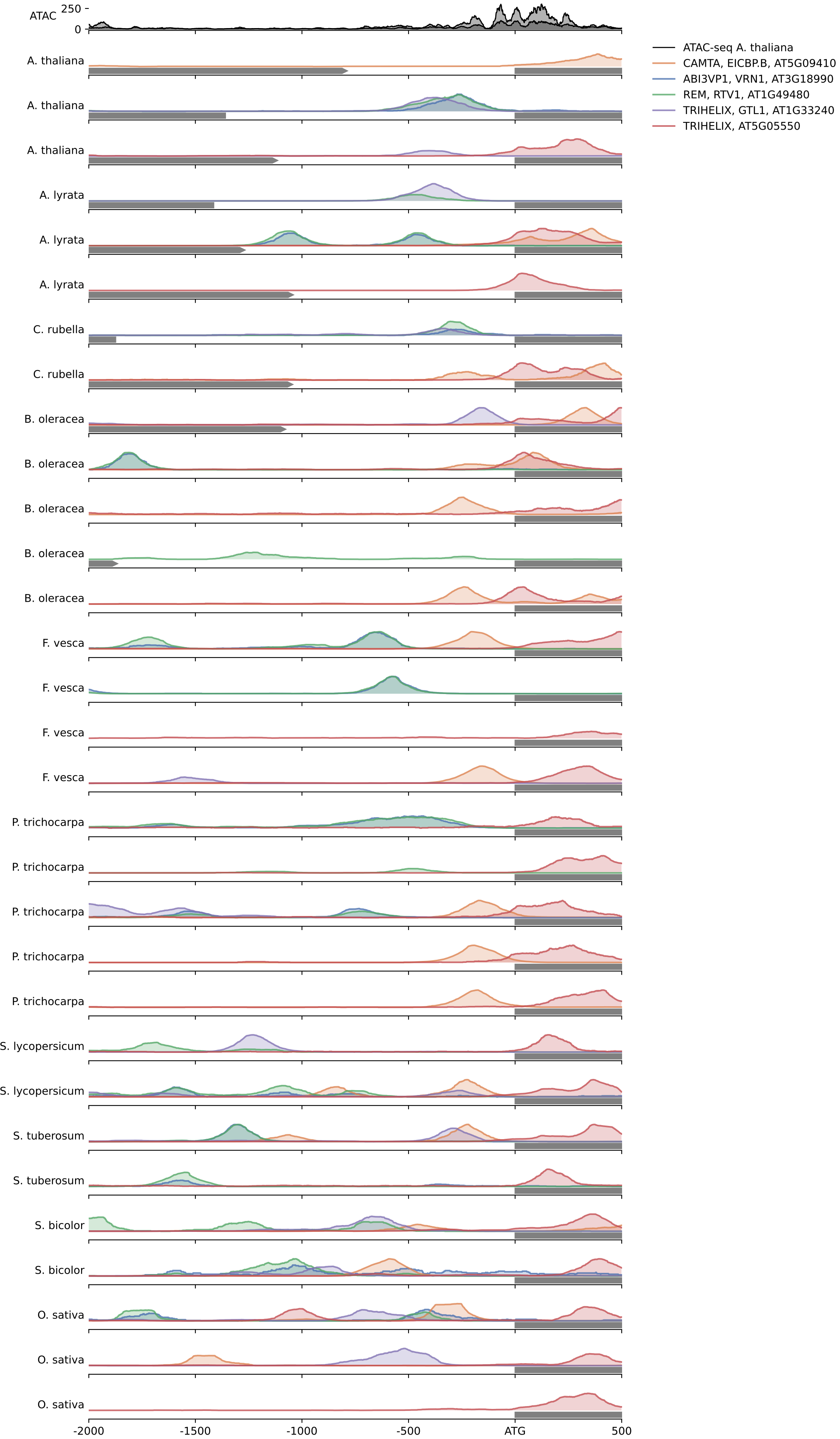


A. thaliana target: AT5G27080, CDC20.3, No expression of gene detected yet.

A. thaliana target: AT4G33270, CDC20.1, Encodes a CDC20 protein that interacts with APC subunits, components of the mitochondrial checkpoint complex and mitotic cyclin substrates and is indispensable for normal plant development and fertility.

A. thaliana target: AT4G33260, CDC20.2, Encodes a CDC20 protein that interacts with APC subunits, components of the mitochondrial checkpoint complex and mitotic cyclin substrates and is indispensable for normal plant development and fertility.

OG0001060

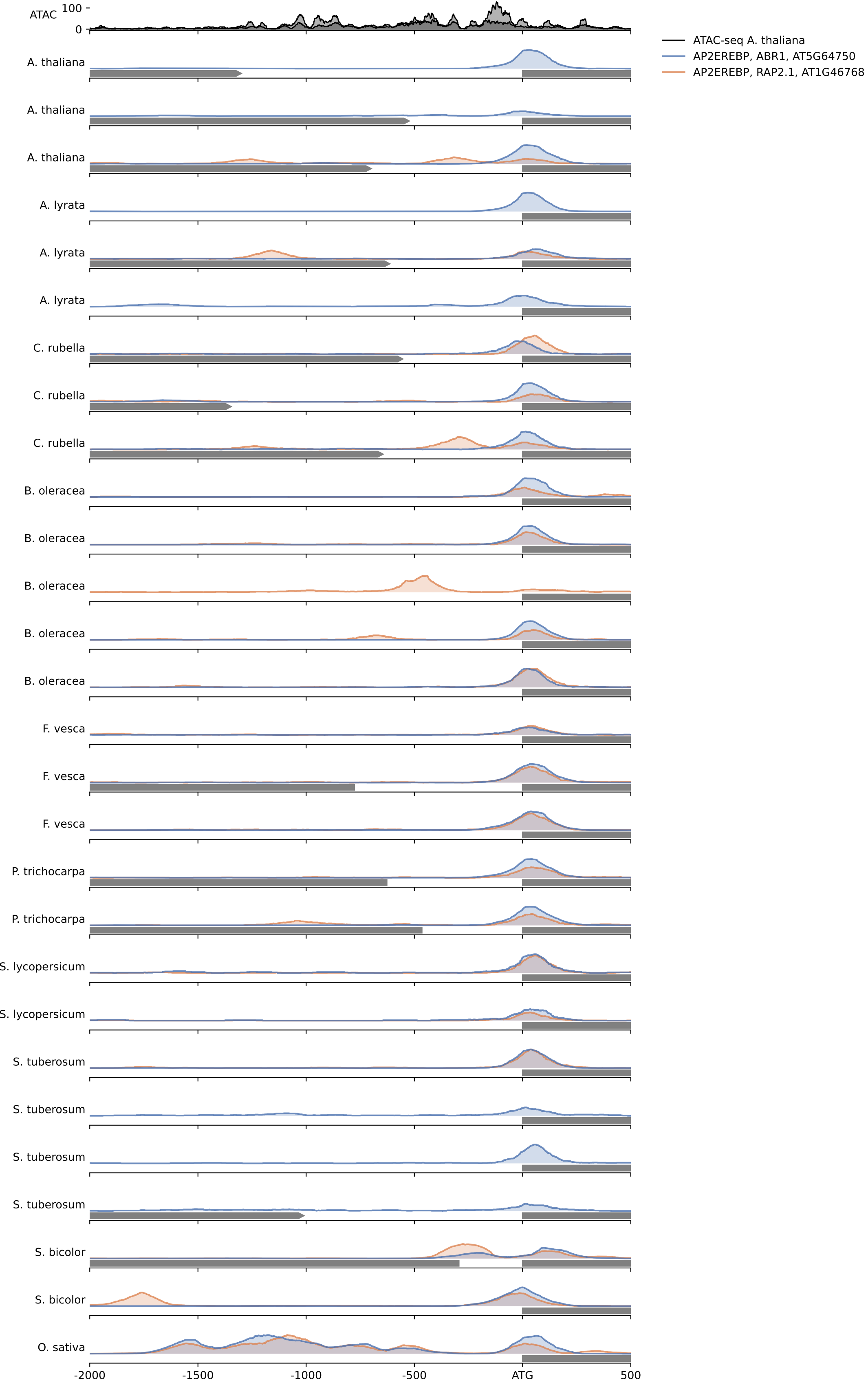


A. thaliana target: AT5G59550, RDUF2, Encodes an ABA- and drought-induced RING-DUF1117 gene whose mutation results in hyposensitive phenotypes toward ABA in terms of germination rate and stomatal closure and markedly reduced tolerance to drought stress relative to wild-type plants.

A. thaliana target: AT2G39720, RHC2A, Encodes a putative RING-H2 finger protein RHC2a.

A. thaliana target: AT3G46620, RDUF1, Encodes an ABA- and drought-induced RING-DUF1117 gene whose mutation results in hyposensitive phenotypes toward ABA in terms of germination rate and stomatal closure and markedly reduced tolerance to drought stress relative to wild-type plants.

OG0001073

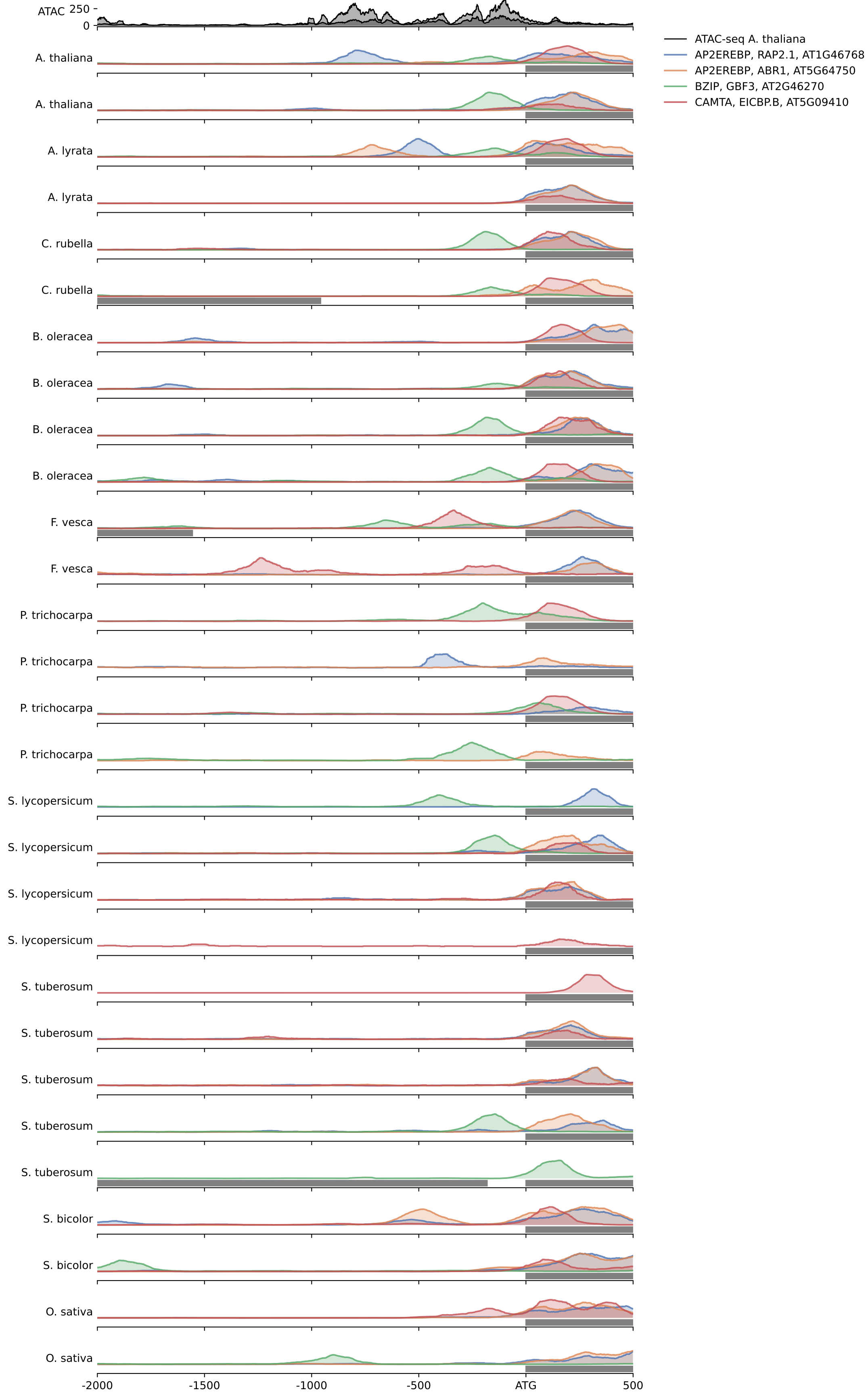


A. thaliana target: AT1G28395, hypothetical protein;(source:Araport11)

A. thaliana target: AT2G20585, NFD6, nuclear fusion defective 6;(source:Araport11)

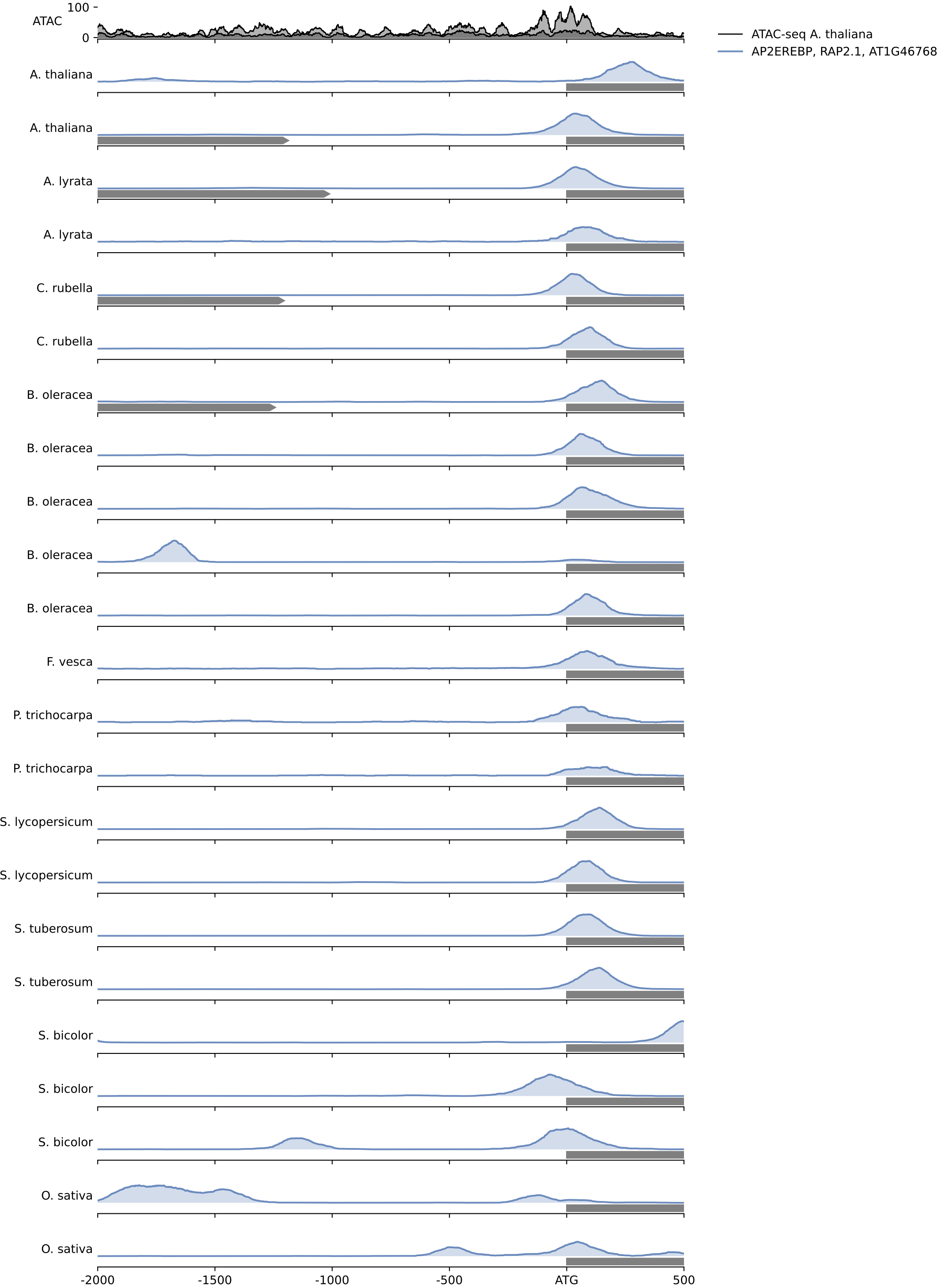
A. thaliana target: AT2G33847, hypothetical protein;(source:Araport11)

OG0001087



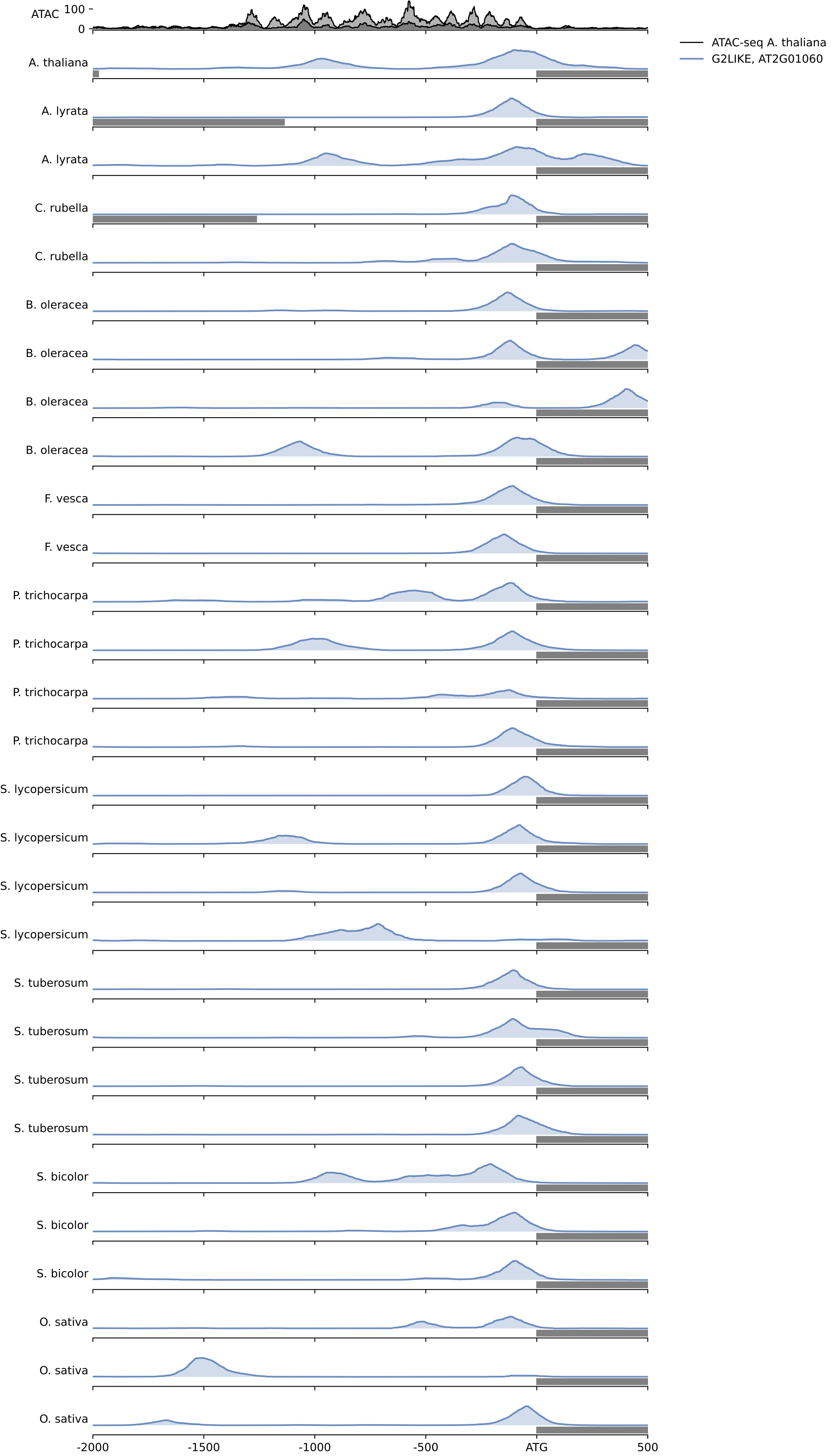
A. thaliana target: AT5G24930, COL4, Flowering repressor in long days (LD) and short days (SD) and acts on the expression of FT and FT-like genes as well as on SUPPRESSOR OF OVEREXPRESSION OF CONSTANS 1 (SOC1).

A. thaliana target: AT5G57660, COL5, CONSTANS-like 5;(source:Araport11)



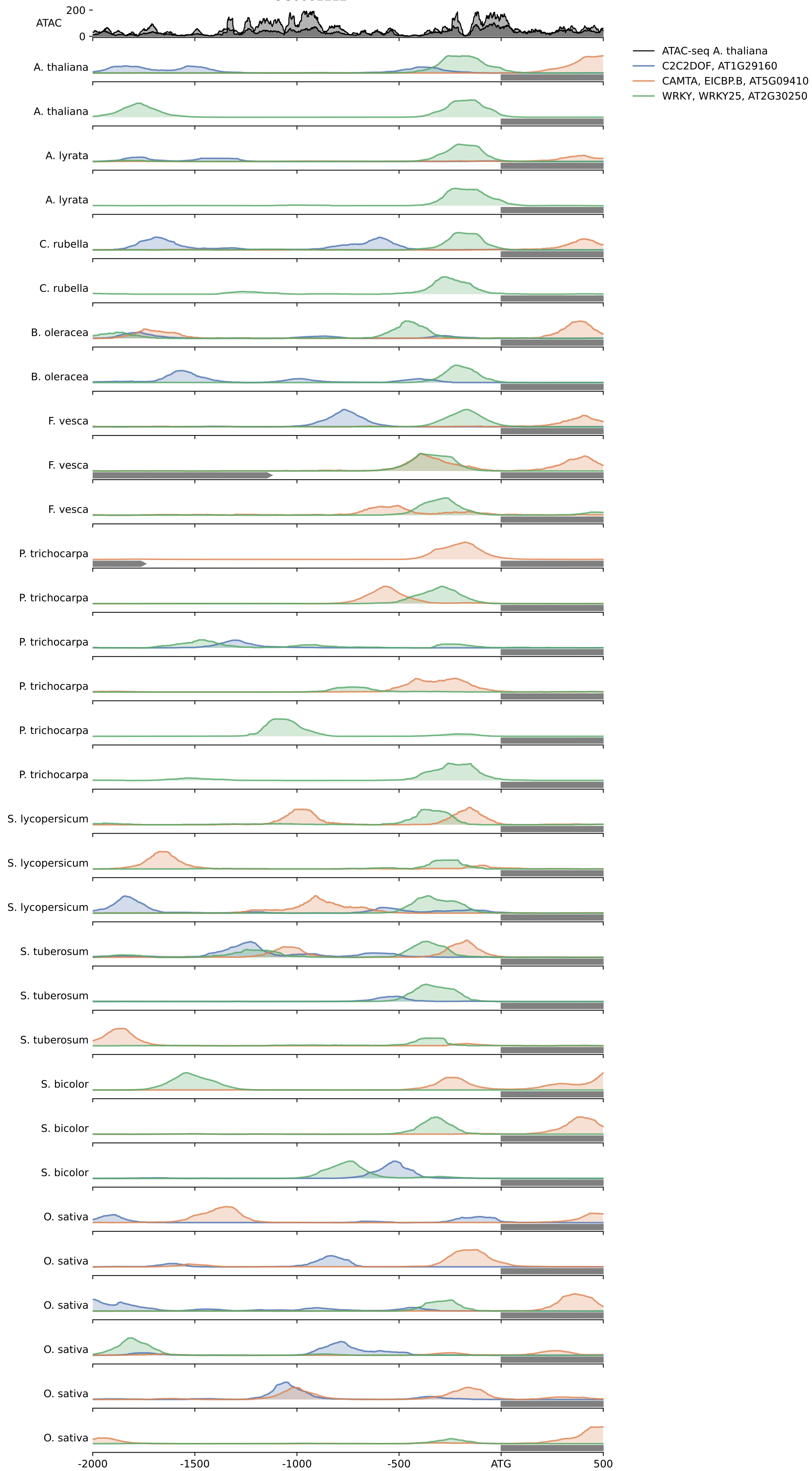
A. thaliana target: AT1G24764, MAP70-2, Member of the MAP70 protein family.
A. thaliana target: AT1G68060, MAP70-1, Encodes a microtubule associated protein (MAP70-1).
Expressed in all tissues.

OG0001099



A. thaliana target: AT3G04530, PPCK2, Encodes a second Arabidopsis phosphoenolpyruvate carboxylase kinase gene product with a different expression pattern from PPCK1. Expression of the gene is upregulated by exposure of the plant to light and is responsive to both phosphate (Pi) and phosphite (Phi) in shoots.

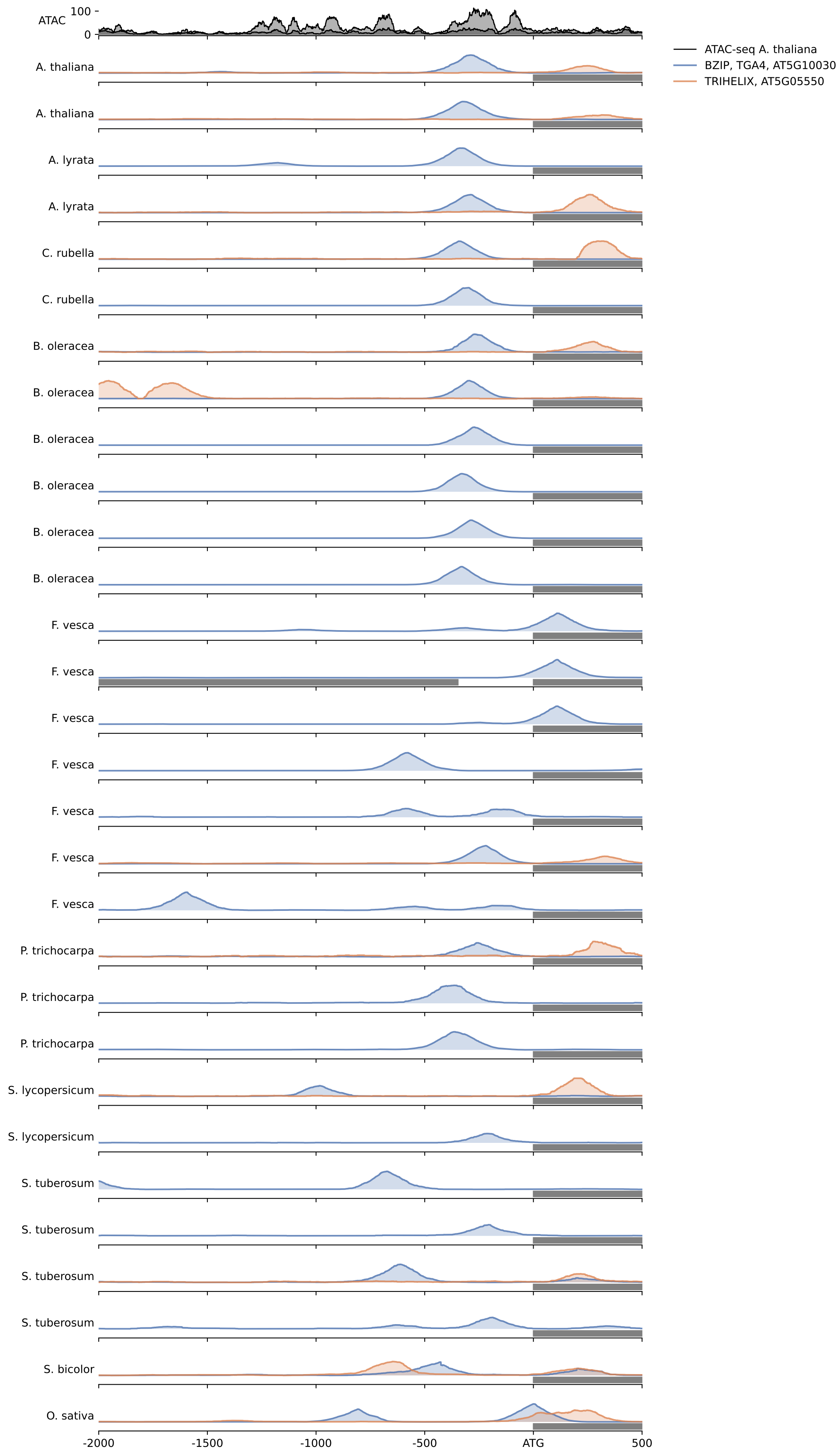
OG0001112



A. thaliana target: AT1G66160, CMPG1, CYS, MET, PRO, and GLY protein 1;(source:Araport11)

A. thaliana target: AT5G37490, Plant U-box type E3 ubiquitin ligase (PUB).

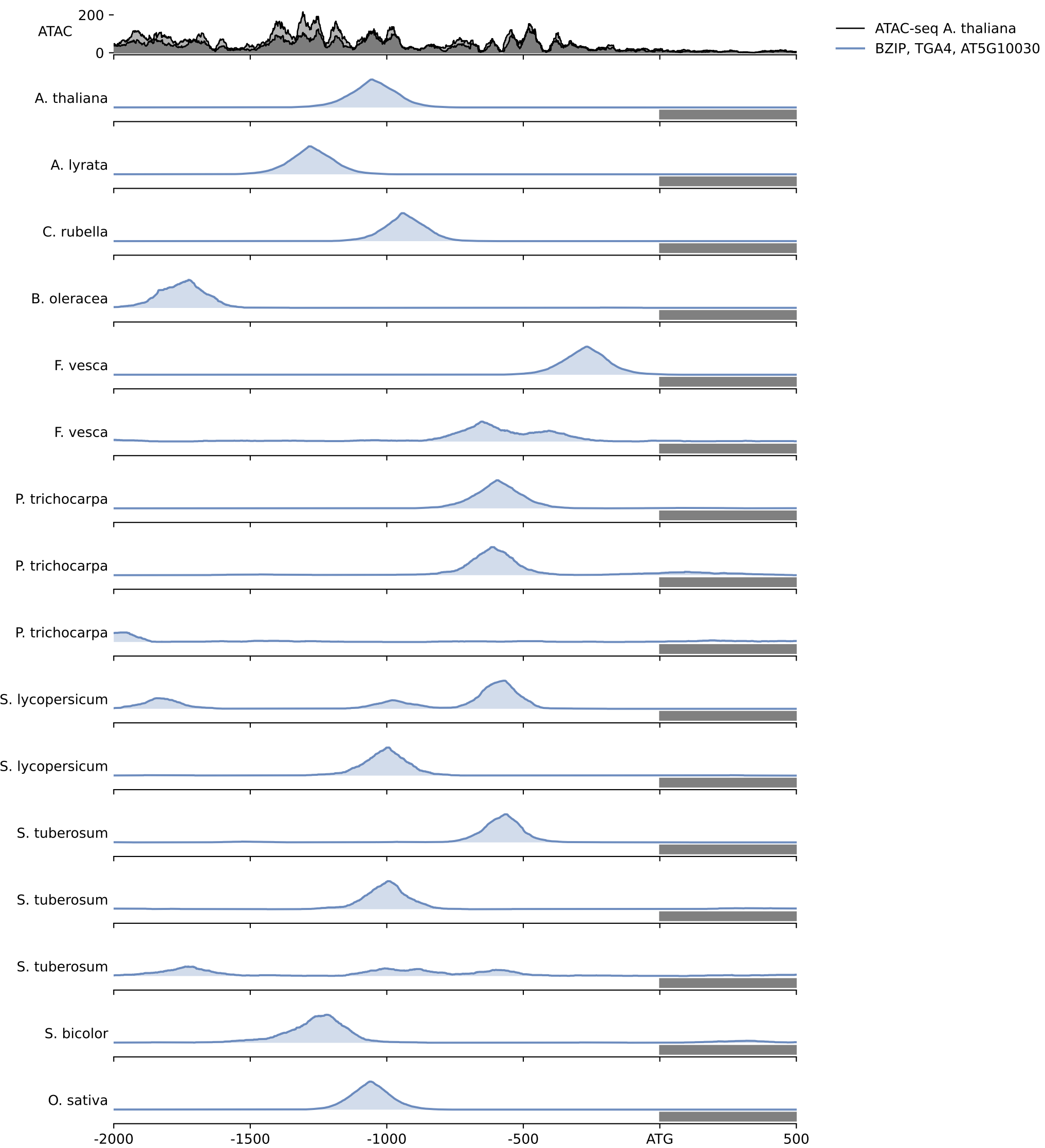
OG0001137



A. thaliana target: AT3G56400, WRKY70, Member of WRKY Transcription Factor; Group III. Function as activator of SA-dependent defense genes and a repressor of JA-regulated genes. WRKY70-controlled suppression of JA-signaling is partly executed by NPR1.

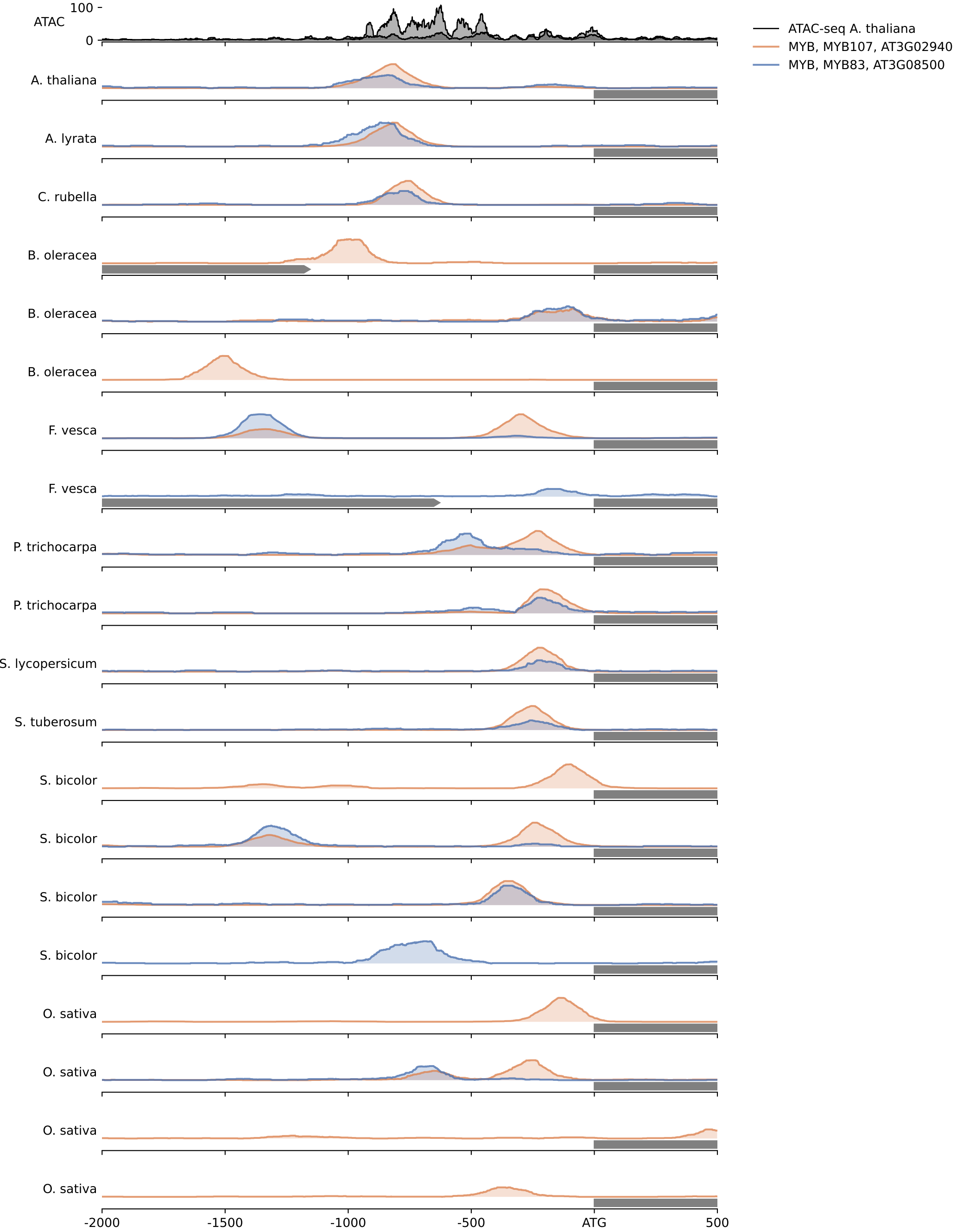
A. thaliana target: AT2G40750, WRKY54, member of WRKY Transcription Factor; Group III. Together with WRKY70 positively regulates SARD1 and CBP60g expression in plant immunity.

OG0001139



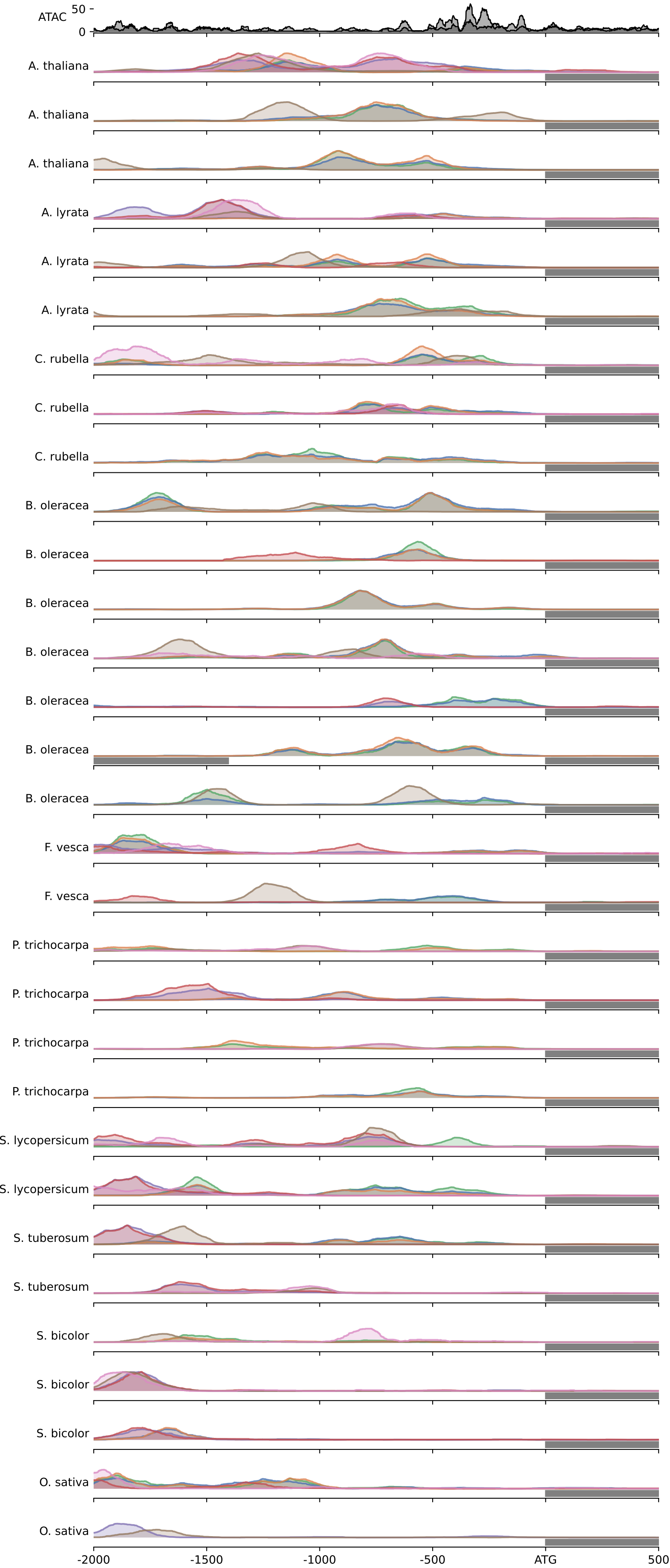
A. thaliana target: AT3G57040, ARR9, response regulator ARR9, A two-component response regulator-like protein with a receiver domain with a conserved aspartate residue and a possible phosphorylation site and at the N-terminal half. Appears to interact with histidine kinase like genes ATPH3 and ATPH2

OG0001151



A. thaliana target: AT3G25640, MIZU-KUSSEI-like protein (Protein of unknown function, DUF617);(source:Araport11)

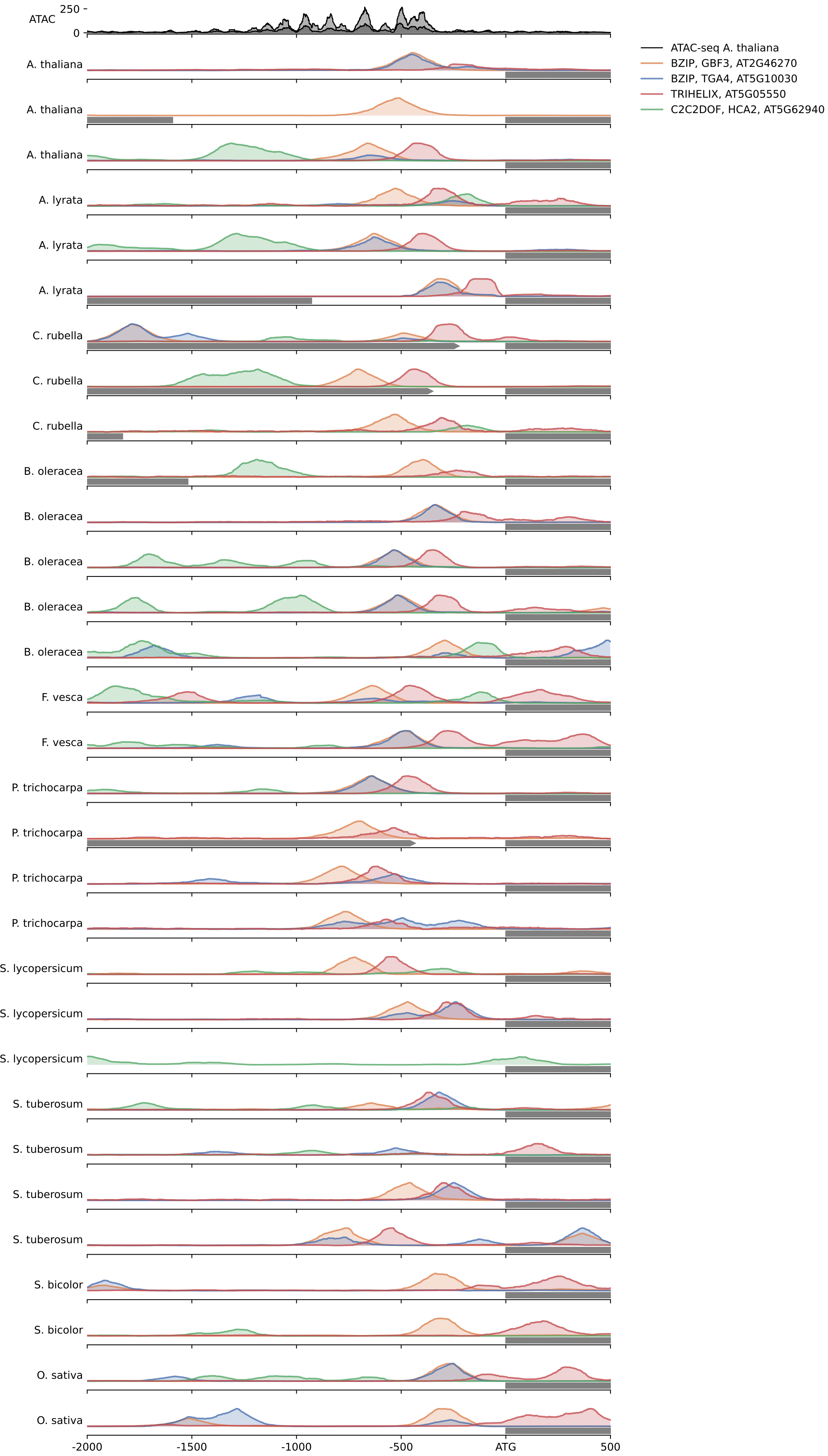
OG0001158



- ATAC-seq A. thaliana
- C2C2DOF, AT1G29160
- C2C2DOF, OBP1, AT3G50410
- C2C2DOF, HCA2, AT5G62940
- HOMEBOX, HB6, AT2G22430
- HOMEBOX, HB51, AT5G03790
- MYBRELATED, RVE1, AT5G17300
- ZFHD, HB23, AT5G39760

A. thaliana target: AT5G28650, WRKY74, member of WRKY Transcription Factor; Group II-d
A. thaliana target: AT3G04670, WRKY39, member of WRKY Transcription Factor; Group II-d
A. thaliana target: AT2G30590, WRKY21, Encodes WRKY DNA-binding protein 21 (WRKY21).

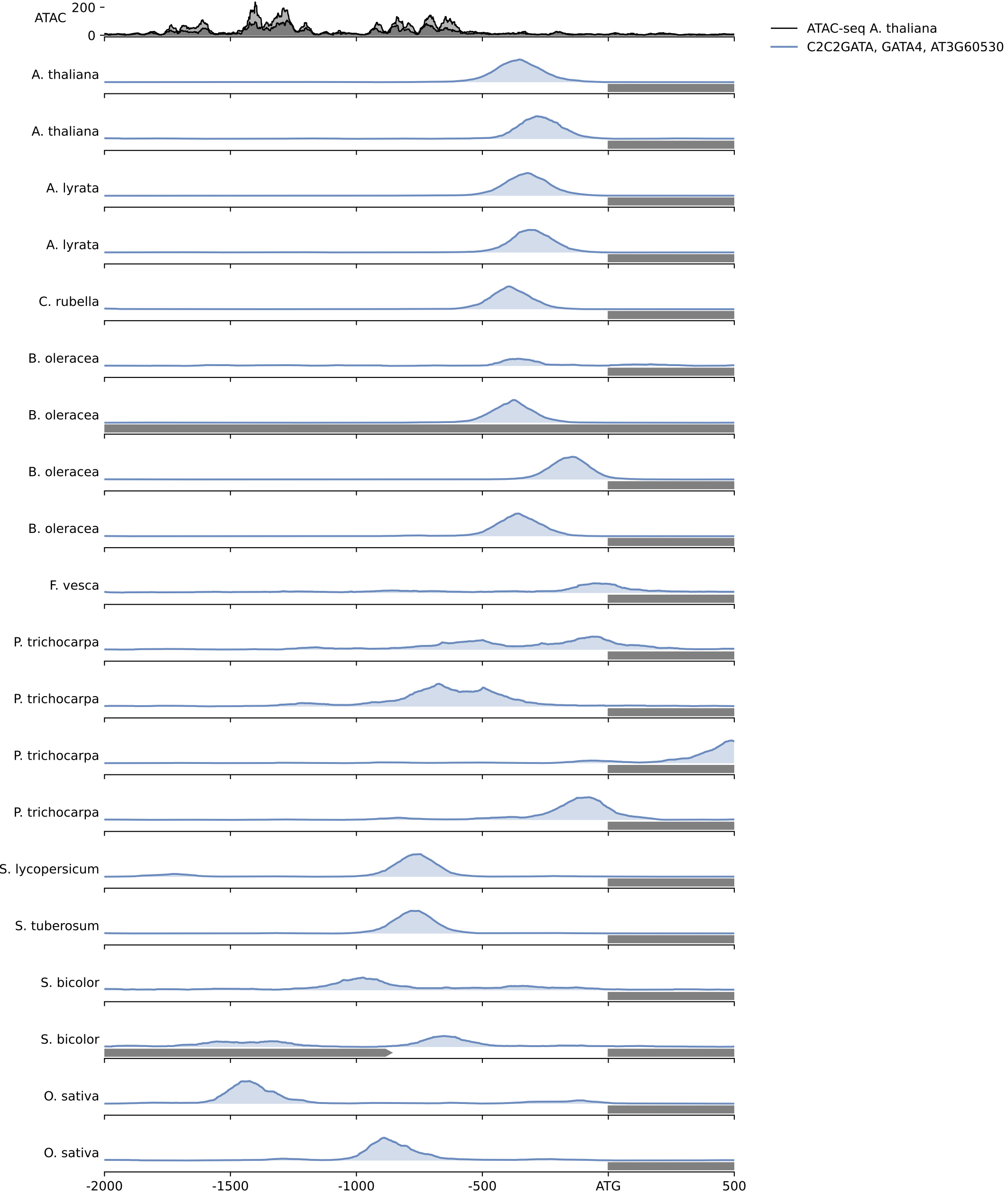
OG0001166



A. thaliana target: AT4G14620, DUF506 gene family member

A. thaliana target: AT2G38820, DUF506 gene family member

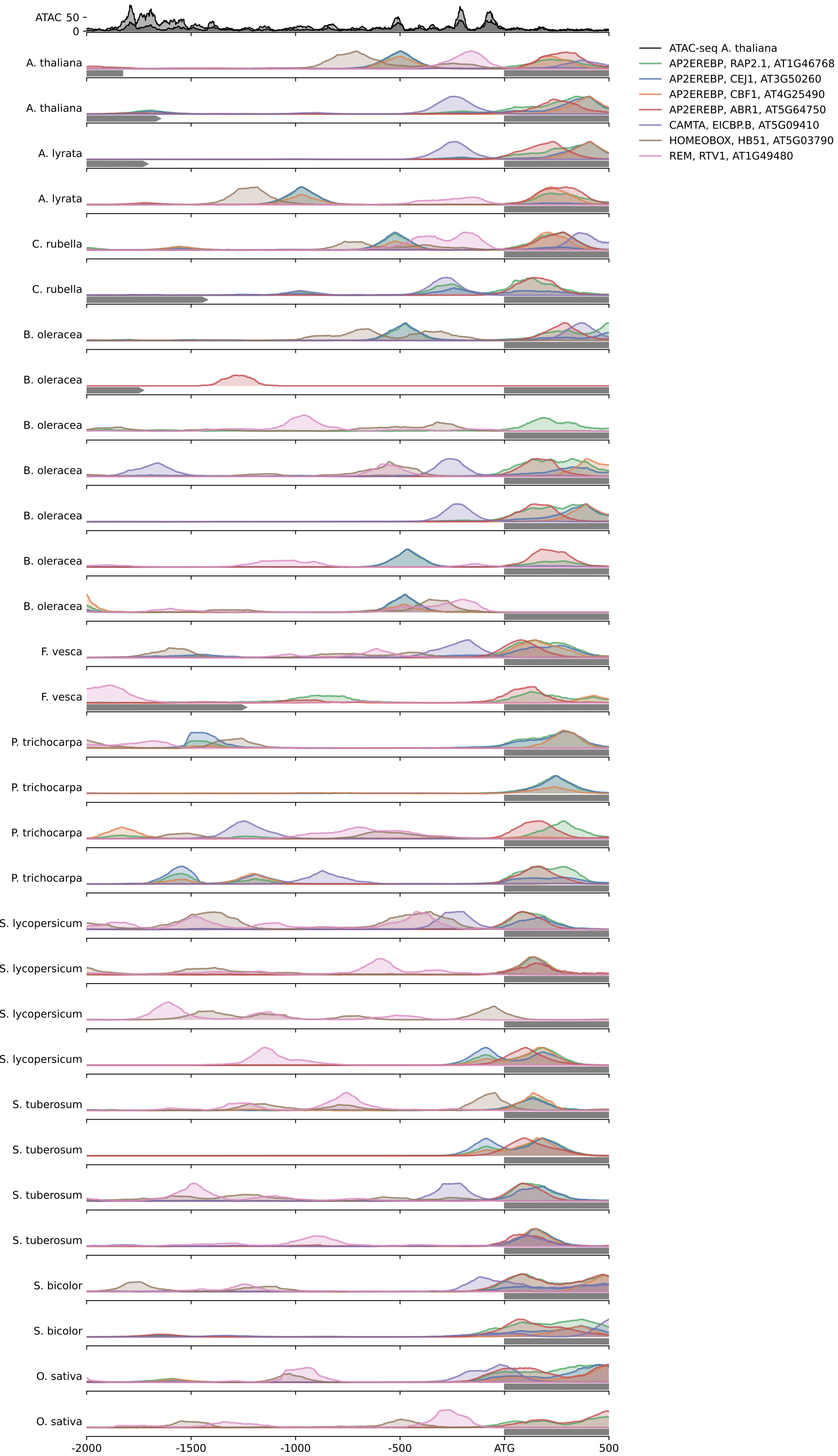
A. thaliana target: AT3G22970, DUF506 gene family member



A. thaliana target: AT5G17920, ATMS1, Encodes a cytosolic cobalamin-independent methionine synthase, involved in methionine regeneration via the activated methyl cycle (SAM cycle). The protein undergoes thiolation following treatment with the oxidant tert-butylhydroperoxide. The mRNA is cell-to-cell mobile.

A. thaliana target: AT3G03780, MS2, Encodes a cytosolic methionine synthase, involved in methionine regeneration via the activated methyl cycle (or SAM cycle)

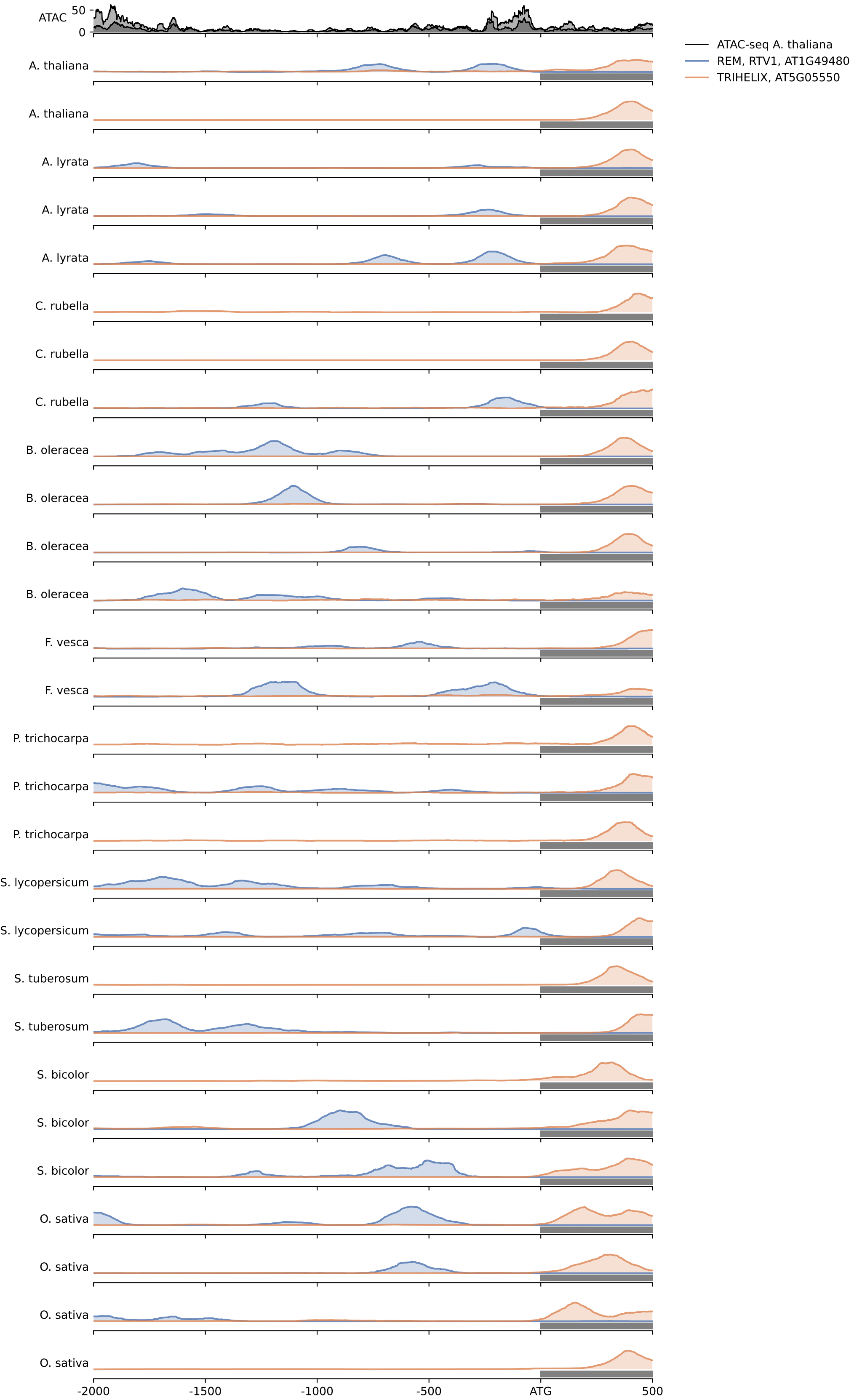
OG0001189



A. thaliana target: AT5G11890, EMB3135, harpin-induced protein;(source:Araport11)

A. thaliana target: AT1G17620, Late embryogenesis abundant (LEA) hydroxyproline-rich glycoprotein family;(source:Araport11)

OG0001192



A. thaliana target: AT1G30100, NCED5, Encodes 9-cis-epoxycarotenoid dioxygenase, a key enzyme in the biosynthesis of abscisic acid. The expression of this gene increases during the first 6h of imbibition.

A. thaliana target: AT3G14440, NCED3, Encodes 9-*cis*-epoxycarotenoid dioxygenase, a key enzyme in the biosynthesis of abscisic acid. Regulated in response to drought and salinity. Expressed in roots, flowers and seeds. Localized to the chloroplast stroma and thylakoid membrane.