

The following six separate regression algorithms were used for the subretinal fluid absorption predictions:

Decision Tree: Decision tree is a basic classification method with a tree structure. Classification problems can be regarded as sets of if-then rules. In every decision tree, all instances are covered by a path or rules. Generally, decision tree learning includes three steps: feature selection, decision tree generation, and decision tree pruning.

AdaBoost.R2: AdaBoost is a boosting algorithm based on the idea of fitting a sequence of weak learners by iterating over the same training set, and the final prediction results are obtained by calculating the weighted combination of the outputs of these weak learners. In the implementation of boosting algorithms, the weight of a sample with poor performance in the previous learner is increased, and the updated sample is then used to retrain the next weak learner. When combining all learners, the weight of each weak learner is decided based on its performance.

Gradient Boosting: Gradient Boosting is a generalization of boosting to arbitrary differentiable loss functions. In this method, the negative gradient of the loss function (the first derivative of the loss function) is used as a measure of the performance of a weak learner, and the weak learner is optimized by reducing the loss function in the direction of the gradient.

Extreme Gradient Boosting: Extreme Gradient Boosting (XGBoost) is an optimized distributed gradient boosting algorithm implemented based on the original Gradient Boosting framework. Instead of the first derivative, which is used in Gradient Boosting, the first-order and second-order Taylor expansions of the loss function are used in the optimization process in XGBoost. Consequently, its accuracy is higher, and fewer iterations are required to achieve satisfactory results. Unlike other boosting methods, XGBoost is able to use multithreading when choosing the best segmentation point. The parallel tree boosting operation substantially reduces the run time.

Random Forest: The Random Forest algorithm is a variant of the bagging (Bootstrap AGGregatING) algorithm that obtains its final results by averaging the predictions of many decision trees. The training set used to construct each decision tree is obtained using the bootstrap method (random sampling with replacement from the original data). Furthermore, when splitting one node during the construction of a tree, a subset of all features at that node is randomly selected, and then an optimal feature is selected from this subset for splitting. Because of the use of random sampling and random feature selection, the Random Forest algorithm is not easily susceptible to overfitting, although no pruning is performed on any single tree.

Extra-Trees: The Extremely Randomized Trees (Extra-Trees) algorithm is a variant of the Random Forest algorithm obtained by introducing random thresholds when splitting nodes. The Random Forest algorithm uses the bootstrap method to obtain the training set, whereas Extra-Trees uses all samples for training. Instead of choosing the most discriminative thresholds in feature subsets, as in the Random Forest algorithm, Extra-Trees randomly selects thresholds for the candidate features and then selects the best threshold for node splitting.

Table S1 Clinical and Imaging Features Used to Predict Subretinal Fluid Absorption

Clinical data				Features from FFA and ICGA		Features from OCTA	
Feature	Description	Feature	Description	Feature	Description	Feature	Description
Age	Age of the patient	Type-A Behavior	Type-A Behavior ³ score	FFA leakage	Existence of active leakage at baseline	High reflection	Existence of high reflection at baseline
Sex	Sex of the patient	Eye	Right or left eye	Single or multiple	No. of active leakage sites on FFA	Position 4	Position of high reflection on OCTA
Height	Height of the patient	Duration	Duration of CSC	Morphology	Morphology of the leakage on FFA	Low reflection	Existence of low reflection at baseline
Weight	Weight of the patient	Therapy	hd-PDT, SML or CL	Area	Area of the leakage on FFA	Position 5	Position of low reflection on OCTA
Education	Education level of the patient	VA Baseline	VA before treatment	Position 1	Position of the leakage on FFA	BVN Baseline	Existence of BVN at baseline
Income	Income level of the patient	VA 1 M	VA at 1 M after treatment	ICGA leakage	Existence of active leakage at baseline	Position 6	Position of BVN at baseline
Heart Disease	History of heart disease	VA 3 M	VA at 3 M after treatment	High permeability	High permeability on ICGA	BVN 1 M	Existence of BVN at 1 M
Gastropathy	History of gastropathy	VA 6 M	VA at 6 M after treatment	Position 2	Position of the high permeability on ICGA	Position 7	Position of BVN at 1 M
Autoimmune Disease	History of autoimmune disease			Low permeability	Low permeability on ICGA	BVN 3 M	Existence of BVN at 3 M
Steroid Usage	History of steroid use			Position 3	Position of the low permeability on ICGA	Position 8	Position of BVN at 3 M
Hamilton Anxiety Scale	Hamilton Anxiety Scale ¹ score					BVN 6 M	Existence of BVN at 6 M
Pittsburgh Sleep Quality Index	Pittsburgh Sleep Quality Index ² score					Position 9	Position of BVN at 6 M
Features from OCT (Baseline)		Features from OCT (1 M)		Features from OCT (3 M)		Features from OCT (6 M)	
Feature	Description	Feature	Description	Feature	Description	Feature	Description
SFA horizontal	Subretinal fluid absorption on horizontal B-scan	SFA horizontal	Subretinal fluid absorption on horizontal B-scan	SFA horizontal	Subretinal fluid absorption on horizontal B-scan	SFA horizontal	Subretinal fluid absorption on horizontal B-scan
SFA vertical	Subretinal fluid absorption on vertical B-scan	SFA vertical	Subretinal fluid absorption on vertical B-scan	SFA vertical	Subretinal fluid absorption on vertical B-scan	SFA vertical	Subretinal fluid absorption on vertical B-scan
SFA	Subretinal fluid absorption at baseline	SFA	Subretinal fluid absorption at 1 M	SFA	Subretinal fluid absorption at 3 M	SFA	Subretinal fluid absorption at 6 M
CMT horizontal	CMT on horizontal B-scan	CMT horizontal	CMT on horizontal B-scan	CMT horizontal	CMT on horizontal B-scan	CMT horizontal	CMT on horizontal B-scan
CMT vertical	CMT on vertical B-scan	CMT vertical	CMT on vertical B-scan	CMT vertical	CMT on vertical B-scan	CMT vertical	CMT on vertical B-scan
CMT	Average CMT at baseline	CMT	Average CMT at 1 M	CMT	Average CMT at 3 M	CMT	Average CMT at 6 M
RNEL horizontal	Thickness of RNEL on horizontal B-scan	RNEL horizontal	Thickness of RNEL on horizontal B-scan	RNEL horizontal	Thickness of RNEL on horizontal B-scan	RNEL horizontal	Thickness of RNEL on horizontal B-scan
RNEL vertical	Thickness of RNEL on vertical B-scan	RNEL vertical	Thickness of RNEL on vertical B-scan	RNEL vertical	Thickness of RNEL on vertical B-scan	RNEL vertical	Thickness of RNEL on vertical B-scan
RNEL	Average thickness of RNEL at baseline	RNEL	Average thickness of RNEL at 1 M	RNEL	Average thickness of RNEL at 3 M	RNEL	Average thickness of RNEL at 6 M
SRF horizontal	Height of SRF on horizontal B-scan	SRF horizontal	Height of SRF on horizontal B-scan	SRF horizontal	Height of SRF on horizontal B-scan	SRF horizontal	Height of SRF on horizontal B-scan
SRF vertical	Height of SRF on vertical B-scan	SRF vertical	Height of SRF on vertical B-scan	SRF vertical	Height of SRF on vertical B-scan	SRF vertical	Height of SRF on vertical B-scan
SRF	Average height of SRF at baseline	SRF	Average height of SRF at 1 M	SRF	Average height of SRF at 3 M	SRF	Average height of SRF at 6 M
ChT horizontal	ChT on horizontal B-scan	ChT horizontal	ChT on horizontal B-scan	ChT horizontal	ChT on horizontal B-scan	ChT horizontal	ChT on horizontal B-scan
ChT vertical	ChT on vertical B-scan	ChT vertical	ChT on vertical B-scan	ChT vertical	ChT on vertical B-scan	ChT vertical	ChT on vertical B-scan
ChT	Average ChT at baseline	ChT	Average ChT at 1 M	ChT	Average ChT at 3 M	ChT	Average ChT at 6 M
EZ horizontal	Integrity of EZ on horizontal B-scan	ChT (1 M-B) horizontal	ChT variation (1M-baseline) on horizontal B-scan	ChT (3 M-1 M) horizontal	ChT variation (3 M-1 M) on horizontal B-scan	ChT (6 M-3 M) horizontal	ChT variation (6 M-3 M) on horizontal B-scan
EZ vertical	Integrity of EZ on vertical B-scan	ChT (1 M-B) vertical	ChT variation (1 M-baseline) on vertical B-scan	ChT (3 M-1 M) vertical	ChT variation (3 M-1 M) on vertical B-scan	ChT (6 M-3 M) vertical	ChT variation (6 M-3 M) on vertical B-scan
EZ	Average integrity of EZ at baseline	ChT (1 M-B)	Average ChT variation (1 M-baseline) at 1 M	ChT (3 M-1 M)	Average ChT variation (3 M-1 M) at 3 M	ChT (6 M-3 M)	Average ChT variation (6 M-3M) at 6 M
PED horizontal	Existence of PED on horizontal B-scan	EZ horizontal	Integrity of EZ on horizontal B-scan	EZ horizontal	Integrity of EZ on horizontal B-scan	EZ horizontal	Integrity of EZ on horizontal B-scan
PED vertical	Existence of PED on vertical B-scan	EZ vertical	Integrity of EZ on vertical B-scan	EZ vertical	Integrity of EZ on vertical B-scan	EZ vertical	Integrity of EZ on vertical B-scan
PED	Existence of PED at baseline	EZ	Average integrity of EZ at 1 M	EZ	Average integrity of EZ at 3 M	EZ	Average integrity of EZ at 6 M
DLS horizontal	Existence of DLS on horizontal B-scan	PED horizontal	Existence of PED on horizontal B-scan	PED horizontal	Existence of PED on horizontal B-scan	PED horizontal	Existence of PED on horizontal B-scan
DLS vertical	Existence of DLS on vertical B-scan	PED vertical	Existence of PED on vertical B-scan	PED vertical	Existence of PED on vertical B-scan	PED vertical	Existence of PED on vertical B-scan
DLS	Existence of DLS at baseline	PED	Existence of PED at 1 M	PED	Existence of PED at 3 M	PED	Existence of PED at 6 M
Bruch's membrane horizontal	Bruch's membrane on horizontal B-scan	DLS horizontal	Existence of DLS on horizontal B-scan	DLS horizontal	Existence of DLS on horizontal B-scan	DLS horizontal	Existence of DLS on horizontal B-scan
Bruch's membrane vertical	Bruch's membrane on vertical B-scan	DLS vertical	Existence of DLS on vertical B-scan	DLS vertical	Existence of DLS on vertical B-scan	DLS vertical	Existence of DLS on vertical B-scan
Bruch's membrane	Bruch's membrane at baseline	DLS	Existence of DLS at 1 M	DLS	Existence of DLS at 3 M	DLS	Existence of DLS at 6 M
		Bruch's membrane horizontal	Bruch's membrane on horizontal B-scan	Bruch's membrane horizontal	Bruch's membrane on horizontal B-scan	Bruch's membrane horizontal	Bruch's membrane on horizontal B-scan
		Bruch's membrane vertical	Bruch's membrane on vertical B-scan	Bruch's membrane vertical	Bruch's membrane on vertical B-scan	Bruch's membrane vertical	Bruch's membrane on vertical B-scan
		Bruch's membrane	Bruch's membrane at 1 M	Bruch's membrane	Bruch's membrane at 3 M	Bruch's membrane	Bruch's membrane at 6 M
				Recurrence horizontal	Recurrence on horizontal B-scan	Recurrence horizontal	Recurrence on horizontal B-scan
				Recurrence vertical	Recurrence on vertical B-scan	Recurrence vertical	Recurrence on vertical B-scan
				Recurrence	Recurrence at 3 M	Recurrence	Recurrence at 6 M

This table shows all 20 clinical features and 145 imaging features used to predict SFA. Twenty features (e.g., the duration of CSC) were retrieved from the electronic medical records, 5 features (e.g., position and area of the leakage point) were calculated from FFA, 5 features (e.g., hyperperfusion and hypoperfusion) were calculated from ICGA, 12 features (e.g., the existence of abnormal reflection and branching vascular network [BVN]) were calculated from OCTA and 123 features (e.g., RNEL, CMT, and EZ) were calculated from OCT. SFA, subretinal fluid absorption; OCT, optical coherence tomography; OCTA, optical coherence tomography angiography; CSC, central serous chorioretinopathy; CL, conventional laser; SML, subthreshold micropulse laser; hd-PDT, half-dose photodynamic therapy; FFA, fundus fluorescein angiography; single or multiple, a label of 1 indicates the existence of a single leakage point and 2 indicates multiple leakage sites; Morphology, a label of 1 indicates smokestack leakage on FFA, 2 indicates focal diffuse leakage, and 3 indicates multiple diffuse leakage sites; area, a label of 1 indicates that the leakage area on FFA was less than the area of the optic disc and 2 indicates a larger area; position (position 1 to position 9), a label of 1 indicates that the damage was located less than 1500 microns away from the fovea and 2 indicates a distance greater than 1500 microns; ICGA, indocyanine green angiography; high permeability, a label of 1 indicates the existence of high permeability and 2 indicates normal permeability; low permeability, a label of 1 indicates the existence of low permeability and 2 indicates normal permeability; high reflection, a label of 1 indicates the existence of high reflection on OCTA and 2 indicates normal reflection; low reflection, a label of 1 indicates the existence of low reflection on OCTA and 2 indicates normal reflection; and BVN, a label of 1 indicates the existence of BVN and 2 indicates a normal structure. All the OCTA features are derived from images of the superficial choroidal layer, defined as 10 microns above the Bruch's membrane to 30 microns below the Bruch's membrane in the 3*3 scanning pattern of Optovue (version 2017.1.0.155) software. SRF, subretinal fluid; CMT, central macular thickness; RNEL, retinal neuroepithelial layer; ChT, choroidal thickness, all measurements are expressed in microns; SFA, a label of 1 indicates an increase in the level of unabsorbed SRF, 2 indicates partially absorbed SRF, and 3 indicates completely absorbed SRF; EZ, ellipsoid zone, a label of 1 indicates the complete absence of the original neurosensory retinal detachment area, 2 indicates the intermittent existence of the original neurosensory retinal detachment area with less than half of the total length, 3 indicates the existence of most of the original neurosensory retinal detachment area and 4 indicates the complete existence of original neurosensory retinal detachment area; PED, retinal pigment epithelial detachment, a label of 1 indicates the existence of PED and 2 indicates a normal structure; DLS, double-layer sign, a label of 1 indicates the existence of DLS and 2 indicates a normal structure; Bruch's membrane, a label of 1 indicates the disruption of Bruch's membrane and 2 indicates a normal membrane; and recurrence, a label of 1 indicates the reappearance of SRF and 2 indicates a normal structure on OCT (in the analysis of quantitative data, we used the mean values of horizontal and vertical B-scans on OCT; in the analysis of qualitative data, we used the worse values of the horizontal and vertical B-scans on OCT).

1. Maier W, Buller R, Philipp M, et al. The Hamilton Anxiety Scale: reliability, validity and sensitivity to change in anxiety and depressive disorders. *J Affect Disord.* 1988;14(1):61-68.
2. Manzar MD, BaHammam AS, Hameed UA, et al. Dimensionality of the Pittsburgh Sleep Quality Index: a systematic review. *Health Qual Life Outcomes.* 2018;16(1):89.
3. Yannuzzi LA. Type-A behavior and central serous chorioretinopathy. *Retina.* 1987;7(2):111-131

Table S2 Clinical and Imaging Features Used to Predict Subretinal Fluid Absorption in the Simplified Model

Clinical data							
Feature	Description	Feature	Description	Feature	Description	Feature	Description
Age	Age of the patient	Hamilton Anxiety Scale	Hamilton Anxiety Scale ¹ score	Therapy	CL, SML, or hd-PDT	VA 3 M	VA at 3 M after treatment
Education	Education level of the patient	Pittsburgh Sleep Quality Index	Pittsburgh Sleep Quality Index ² score	VA Baseline	VA before treatment	VA 6 M	VA at 6 M after treatment
Income	Income level of the patient	Duration	Duration of CSC	VA 1 M	VA at 1 M after treatment		
Features from OCT (Baseline)		Features from OCT (1 M)		Features from OCT (3 M)		Features from OCT (6 M)	
Feature	Description	Feature	Description	Feature	Description	Feature	Description
SFA horizontal	Subretinal fluid absorption on horizontal B-scan	SFA horizontal	Subretinal fluid absorption on horizontal B-scan	SFA horizontal	Subretinal fluid absorption on horizontal B-scan	SFA horizontal	Subretinal fluid absorption on horizontal B-scan
SFA vertical	Subretinal fluid absorption on vertical B-scan	SFA vertical	Subretinal fluid absorption on vertical B-scan	SFA vertical	Subretinal fluid absorption on vertical B-scan	SFA vertical	Subretinal fluid absorption on vertical B-scan
SFA	Subretinal fluid absorption at baseline	SFA	Subretinal fluid absorption at 1 M	SFA	Subretinal fluid absorption at 3 M	SFA	Subretinal fluid absorption at 6 M
CMT horizontal	CMT on horizontal B-scan	CMT horizontal	CMT on horizontal B-scan	CMT horizontal	CMT on horizontal B-scan	CMT horizontal	CMT on horizontal B-scan
CMT vertical	CMT on vertical B-scan	CMT vertical	CMT on vertical B-scan	CMT vertical	CMT on vertical B-scan	CMT vertical	CMT on vertical B-scan
CMT	Average CMT at baseline	CMT	Average CMT at 1 M	CMT	Average CMT at 3 M	CMT	Average CMT at 6 M
RNEL horizontal	Thickness of RNEL on horizontal B-scan	RNEL horizontal	Thickness of RNEL on horizontal B-scan	RNEL horizontal	Thickness of RNEL on horizontal B-scan	RNEL horizontal	Thickness of RNEL on horizontal B-scan
RNEL vertical	Thickness of RNEL on vertical B-scan	RNEL vertical	Thickness of RNEL on vertical B-scan	RNEL vertical	Thickness of RNEL on vertical B-scan	RNEL vertical	Thickness of RNEL on vertical B-scan
RNEL	Average thickness of RNEL at baseline	RNEL	Average thickness of RNEL at 1 M	RNEL	Average thickness of RNEL at 3 M	RNEL	Average thickness of RNEL at 6 M
SRF horizontal	Height of SRF on horizontal B-scan	SRF horizontal	Height of SRF on horizontal B-scan	SRF horizontal	Height of SRF on horizontal B-scan	SRF horizontal	Height of SRF on horizontal B-scan
SRF vertical	Height of SRF on vertical B-scan	SRF vertical	Height of SRF on vertical B-scan	SRF vertical	Height of SRF on vertical B-scan	SRF vertical	Height of SRF on vertical B-scan
SRF	Average height of SRF at baseline	SRF	Average height of SRF at 1 M	SRF	Average height of SRF at 3 M	SRF	Average height of SRF at 6 M
ChT horizontal	ChT on horizontal B-scan	ChT horizontal	ChT on horizontal B-scan	ChT horizontal	ChT on horizontal B-scan	ChT horizontal	ChT on horizontal B-scan
ChT vertical	ChT on vertical B-scan	ChT vertical	ChT on vertical B-scan	ChT vertical	ChT on vertical B-scan	ChT vertical	ChT on vertical B-scan
ChT	Average ChT at baseline	ChT	Average ChT at 1 M	ChT	Average ChT at 3 M	ChT	Average ChT at 6 M
EZ horizontal	Integrity of EZ on horizontal B-scan	ChT (1 M-B) horizontal	ChT variation (1M-baseline) on horizontal B-scan	ChT (3 M-1 M) horizontal	ChT variation (3 M-1 M) on horizontal B-scan	ChT (6 M-3 M) horizontal	ChT variation (6 M-3 M) on horizontal B-scan
EZ vertical	Integrity of EZ on vertical B-scan	ChT (1 M-B) vertical	ChT variation (1 M-baseline) on vertical B-scan	ChT (3 M-1 M) vertical	ChT variation (3 M-1 M) on vertical B-scan	ChT (6 M-3 M) vertical	ChT variation (6 M-3 M) on vertical B-scan
EZ	Average integrity of EZ at baseline	ChT (1 M-B)	Average ChT variation (1 M-baseline) at 1 M	ChT (3 M-1 M)	Average ChT variation (3 M-1 M) at 3 M	ChT (6 M-3 M)	Average ChT variation (6 M-3M) at 6 M
PED horizontal	Existence of PED on horizontal B-scan	EZ horizontal	Integrity of EZ on horizontal B-scan	EZ horizontal	Integrity of EZ on horizontal B-scan	EZ horizontal	Integrity of EZ on horizontal B-scan
PED vertical	Existence of PED on vertical B-scan	EZ vertical	Integrity of EZ on vertical B-scan	EZ vertical	Integrity of EZ on vertical B-scan	EZ vertical	Integrity of EZ on vertical B-scan
PED	Existence of PED at baseline	EZ	Average integrity of EZ at 1 M	EZ	Average integrity of EZ at 3 M	EZ	Average integrity of EZ at 6 M
DLS horizontal	Existence of DLS on horizontal B-scan	PED horizontal	Existence of PED on horizontal B-scan	PED horizontal	Existence of PED on horizontal B-scan	PED horizontal	Existence of PED on horizontal B-scan
DLS vertical	Existence of DLS on vertical B-scan	PED vertical	Existence of PED on vertical B-scan	PED vertical	Existence of PED on vertical B-scan	PED vertical	Existence of PED on vertical B-scan
DLS	Existence of DLS at baseline	PED	Existence of PED at 1 M	PED	Existence of PED at 3 M	PED	Existence of PED at 6 M
Bruch's membrane horizontal	Bruch's membrane on horizontal B-scan	DLS horizontal	Existence of DLS on horizontal B-scan	DLS horizontal	Existence of DLS on horizontal B-scan	DLS horizontal	Existence of DLS on horizontal B-scan
Bruch's membrane vertical	Bruch's membrane on vertical B-scan	DLS vertical	Existence of DLS on vertical B-scan	DLS vertical	Existence of DLS on vertical B-scan	DLS vertical	Existence of DLS on vertical B-scan
Bruch's membrane	Bruch's membrane at baseline	DLS	Existence of DLS at 1 M	DLS	Existence of DLS at 3 M	DLS	Existence of DLS at 6 M
		Bruch's membrane horizontal	Bruch's membrane on horizontal B-scan	Bruch's membrane horizontal	Bruch's membrane on horizontal B-scan	Bruch's membrane horizontal	Bruch's membrane on horizontal B-scan
		Bruch's membrane vertical	Bruch's membrane on vertical B-scan	Bruch's membrane vertical	Bruch's membrane on vertical B-scan	Bruch's membrane vertical	Bruch's membrane on vertical B-scan
		Bruch's membrane	Bruch's membrane at 1 M	Bruch's membrane	Bruch's membrane at 3 M	Bruch's membrane	Bruch's membrane at 6 M
				Recurrence horizontal	Recurrence on horizontal B-scan	Recurrence horizontal	Recurrence on horizontal B-scan
				Recurrence vertical	Recurrence on vertical B-scan	Recurrence vertical	Recurrence on vertical B-scan
				Recurrence	Recurrence at 3 M	Recurrence	Recurrence at 6 M

This table shows all 11 clinical features and 123 imaging features used to predict SFA in the simplified model. Eleven features (e.g., duration of CSC) were retrieved from the electronic medical records, and 123 features (e.g., RNEL, CMT, and EZ) were calculated from OCT. SFA, subretinal fluid absorption; OCT, optical coherence tomography; CSC, central serous chorioretinopathy; CL, conventional laser; SML, subthreshold micropulse laser; hd-PDT, half-dose photodynamic therapy; SRF, subretinal fluid; CMT, central macular thickness; RNEL, retinal neuroepithelial layer; ChT, choroidal thickness, all measurements are expressed in microns; SFA, a label of 1 indicates an increase in the level of unabsorbed SRF, 2 indicates partially absorbed SRF, and 3 indicates completely absorbed SRF; EZ, ellipsoid zone, a label of 1 indicates the complete absence of the original neurosensory retinal detachment area, 2 indicates the intermittent existence of the original neurosensory retinal detachment area with less than half of the total length, 3 indicates the existence of most of the original neurosensory retinal detachment area and 4 indicates the complete existence of original neurosensory retinal detachment area; PED, retinal pigment epithelial detachment, a label of 1 indicates the existence of PED and 2 indicates a normal structure; DLS, double-layer sign, a label of 1 indicates the existence of DLS and 2 indicates a normal structure; Bruch's membrane, a label of 1 indicates the disruption of Bruch's membrane and 2 indicates a normal membrane; and recurrence, a label of 1 indicates the reappearance of SRF and 2 indicates a normal structure on OCT (in the analysis of quantitative data, we used the mean values of horizontal and vertical B-scans on OCT; in the analysis of qualitative data, we used the worse value of the horizontal and vertical B-scans on OCT).

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2. Manzar MD, BaHammam AS, Hameed UA, et al. Dimensionality of the Pittsburgh Sleep Quality Index: a systematic review. *Health Qual Life Outcomes.* 2018;16(1):89.

Predict SFA 1 M with Baseline Data

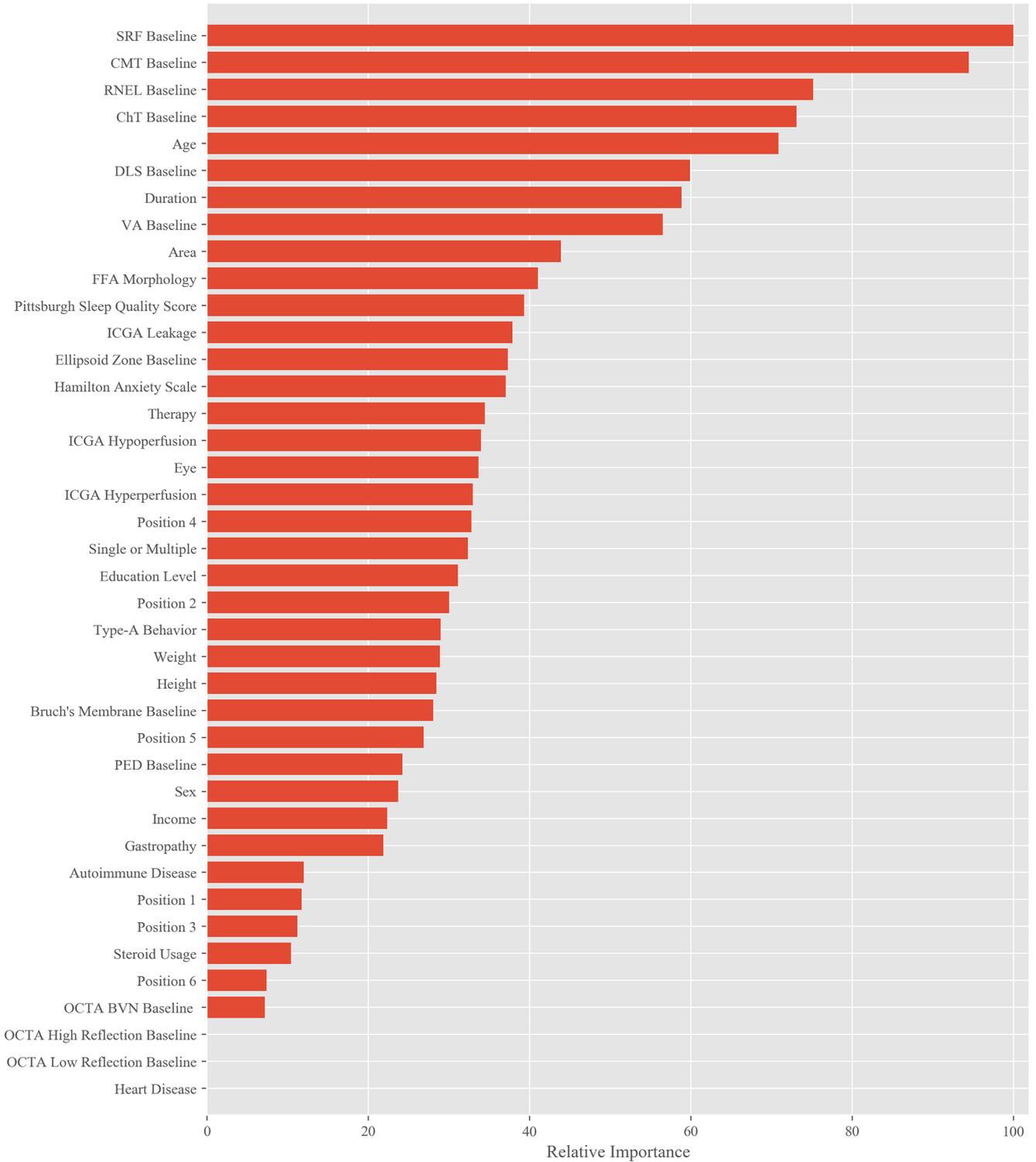


Figure S1 Relative Importance of Different Features to the 1 M Prediction of the Full Model. This figure shows the relative importance of the baseline data in the SFA predictions.

Predict SFA 3 M with Baseline and 1 M Data

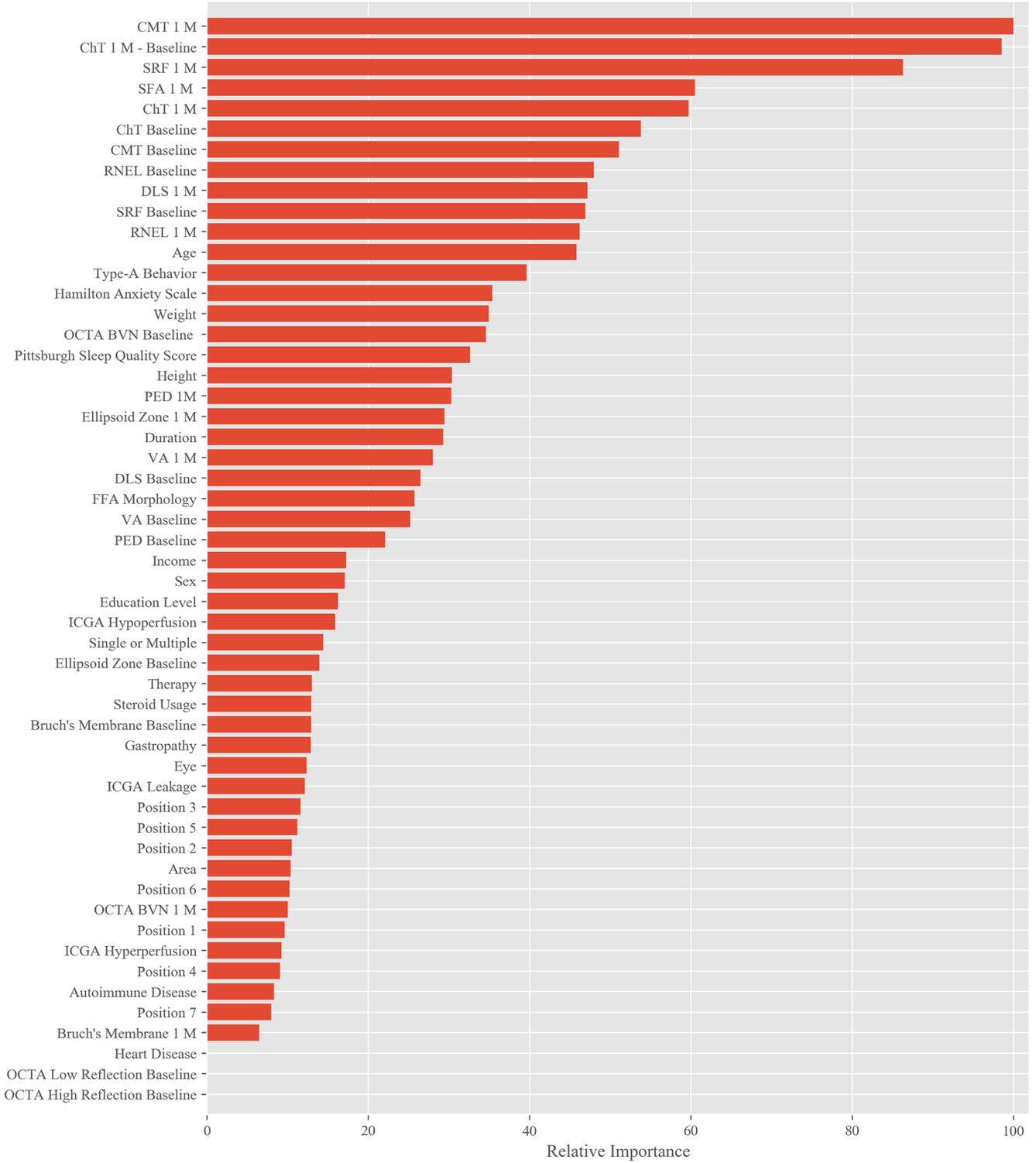


Figure S2 Relative Importance of Different Features to the 3 M Prediction of the Full Model. This figure shows the relative importance of the baseline and 1 M data in the SFA predictions.

Predict SFA 6 M with Baseline, 1 M and 3 M Data

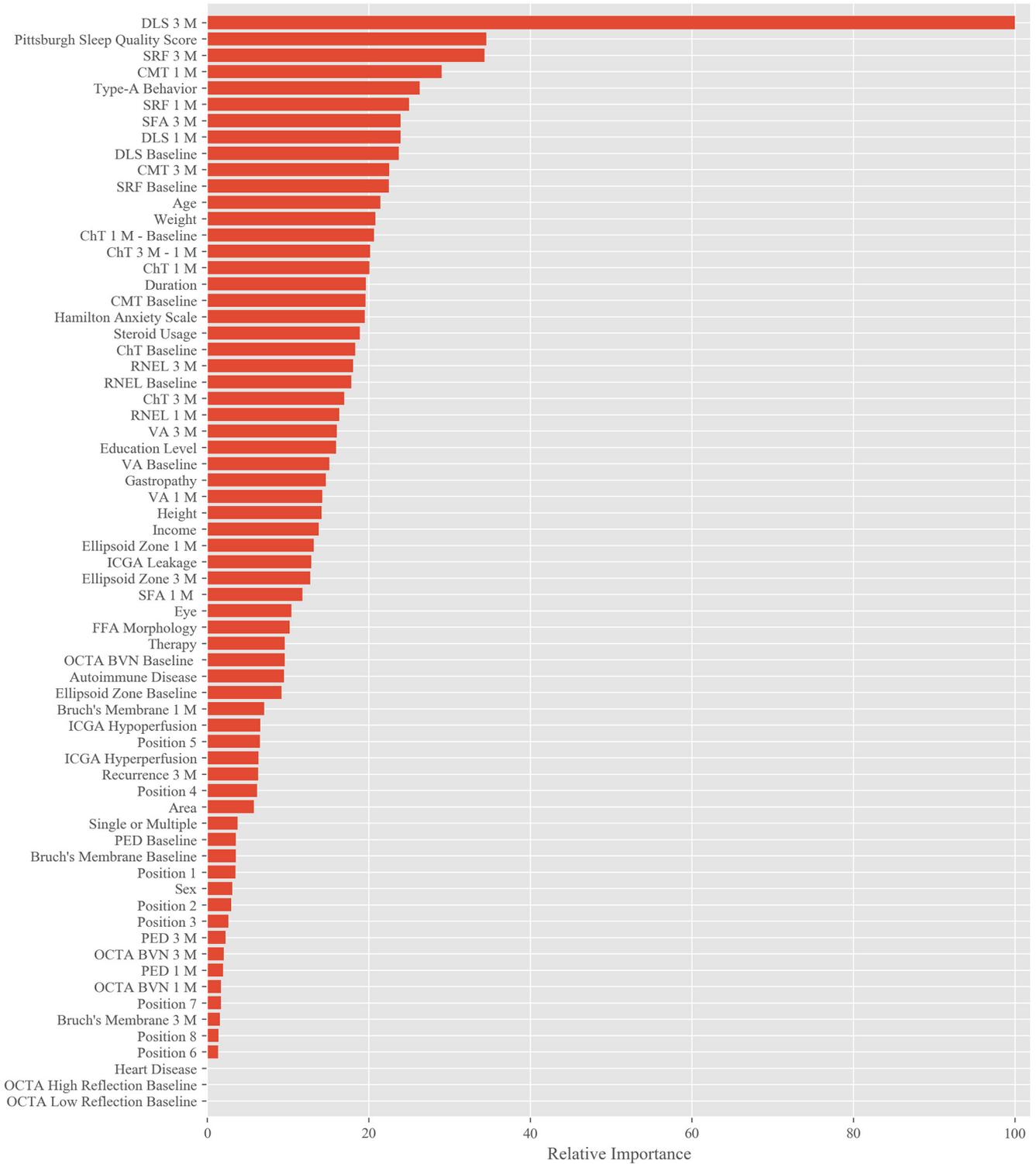


Figure S3 Relative Importance of Different Features to the 6 M Prediction of the Full Model. This figure shows the relative importance of the baseline, 1 M and 3 M data in the SFA predictions.

Predict SFA 1 M with Baseline Data

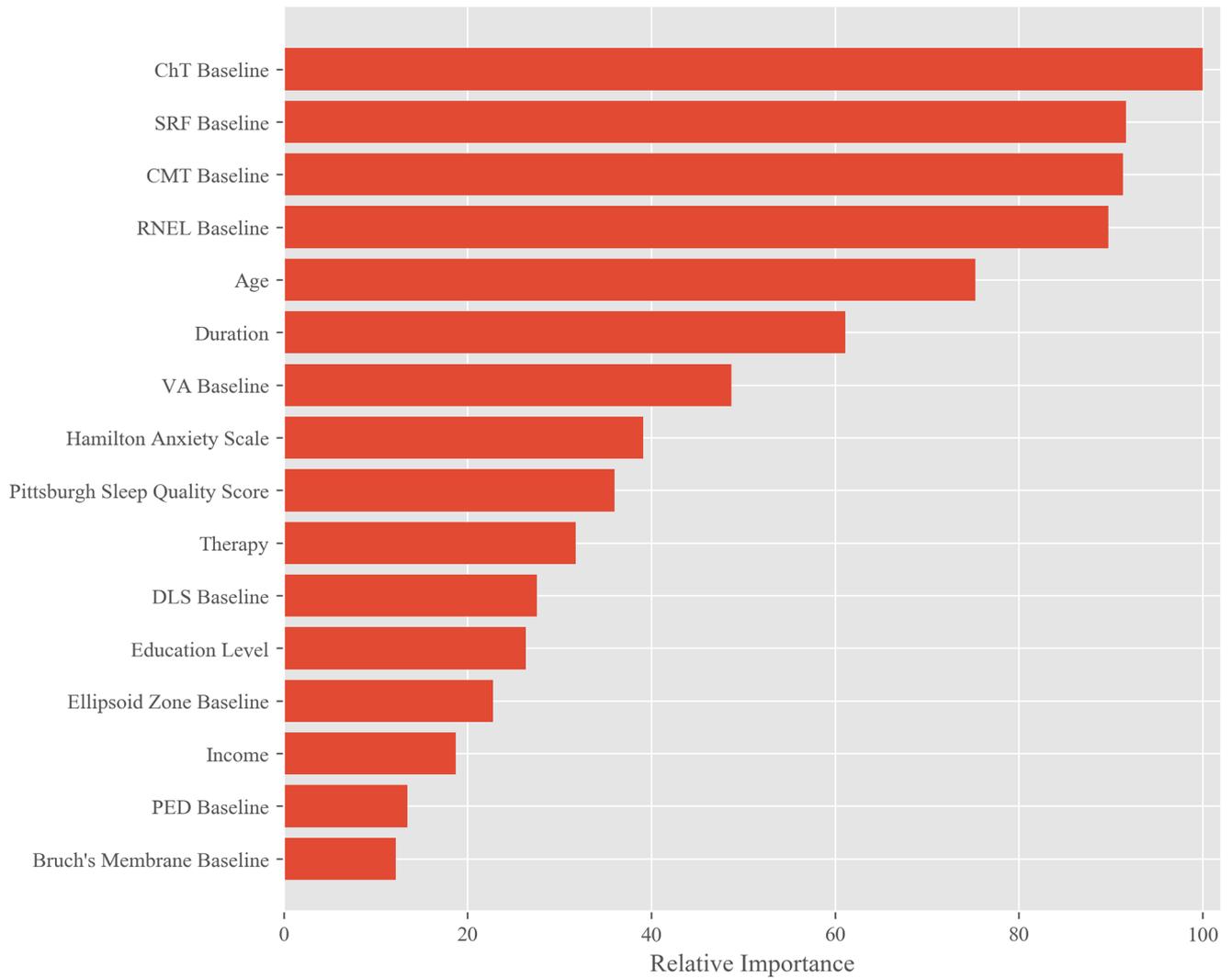


Figure S4 Relative Importance of Different Features to the 1 M Prediction of the Simplified Model. This figure shows the relative importance of the baseline data in the SFA predictions.

Predict SFA 3 M with Baseline and 1 M Data

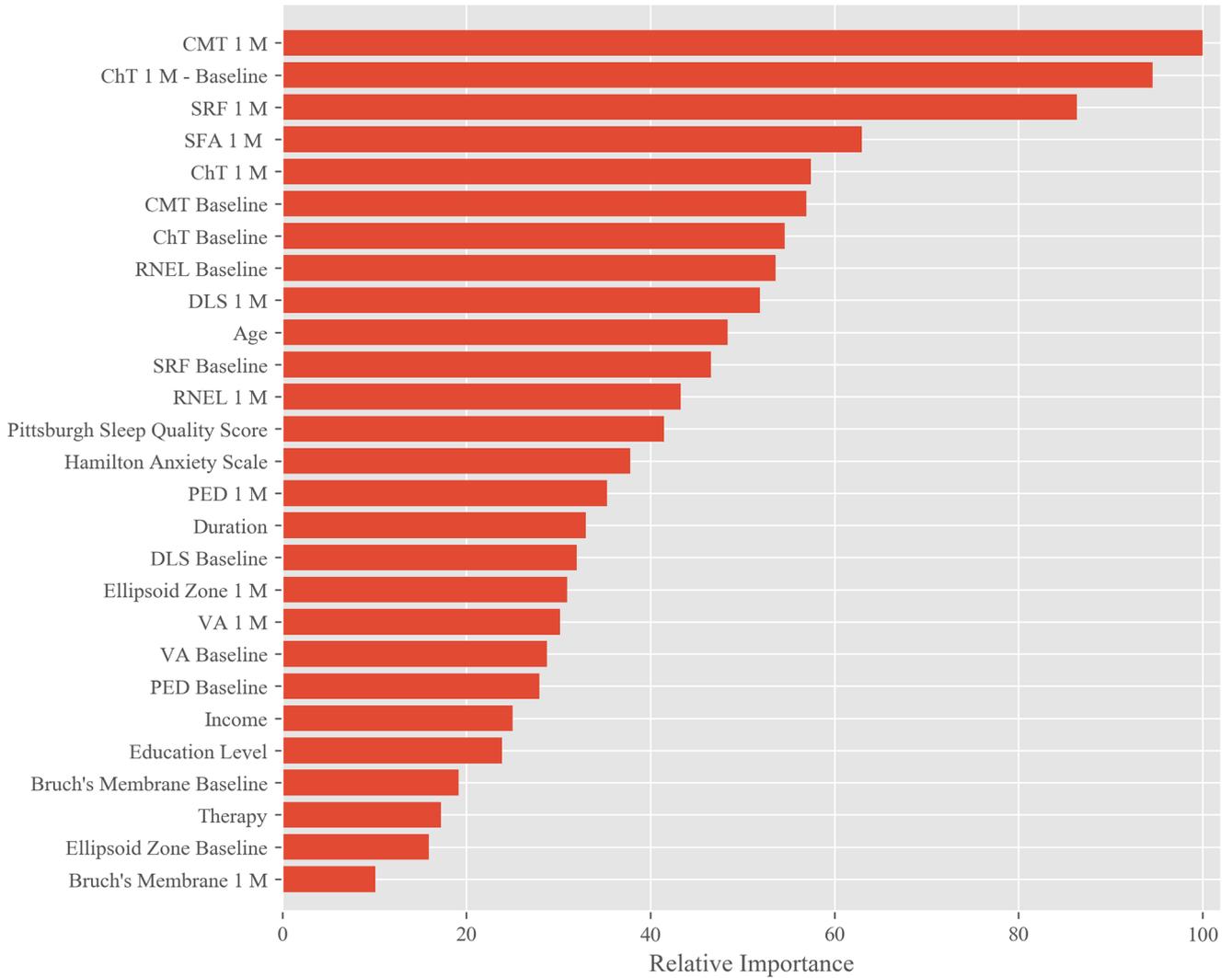


Figure S5 Relative Importance of Different Features to the 3 M Prediction of the Simplified Model. This figure shows the relative importance of the baseline and 1 M data in the SFA predictions.

Predict SFA 6 M with Baseline, 1 M and 3 M Data

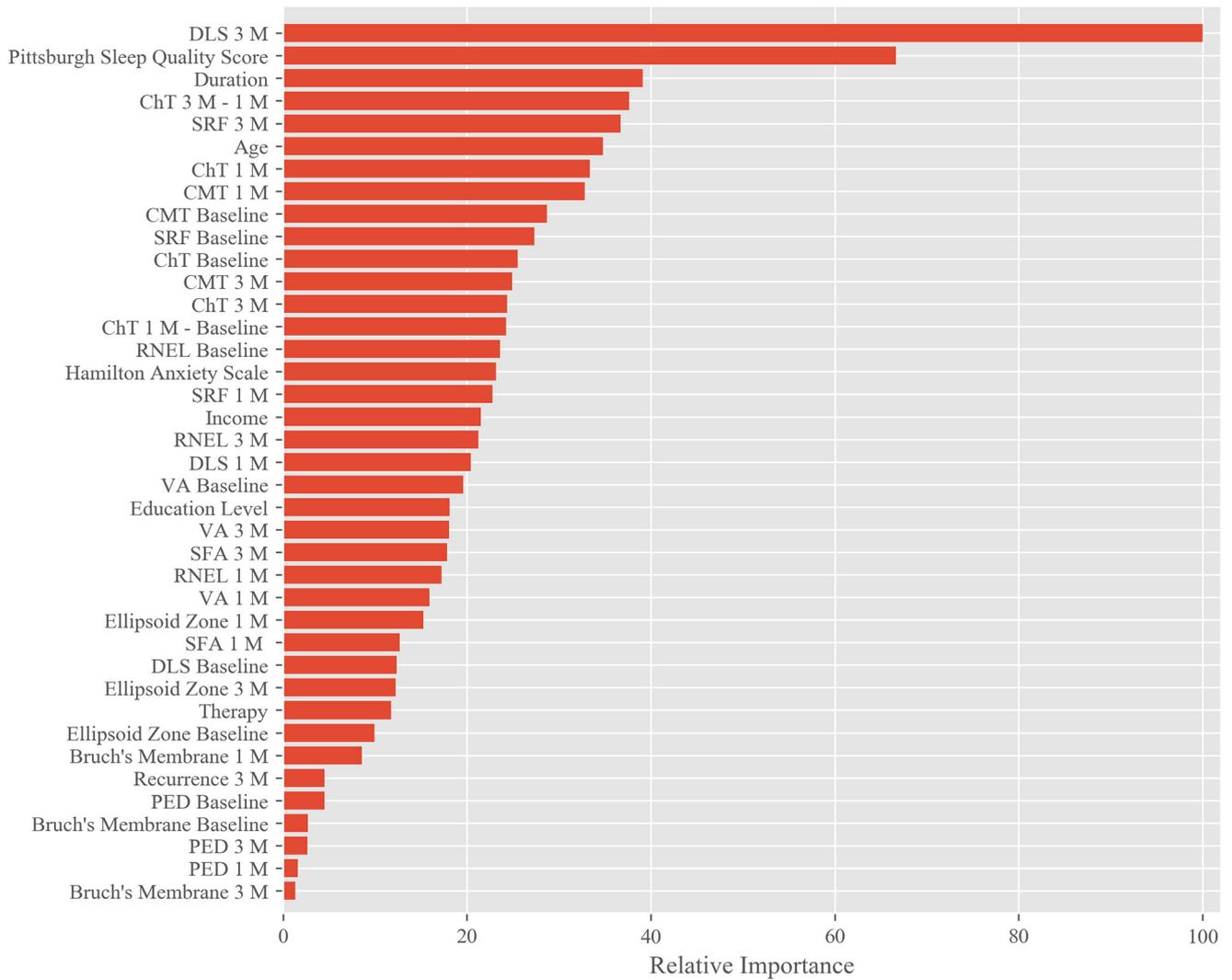


Figure S6 Relative Importance of Different Features to the 6 M Prediction of the Simplified Model. This figure shows the relative importance of the baseline, 1 M and 3 M data in the SFA predictions.