API Endpoint Summary



Here is the information in tabular form:

Endpoint	Method	Summary	Parameters	Request Body	Responses	Security
/devices	POST	Register a new device under an authenticated user	None	name (string), type (string), metadata (object: location, model)	201: Device registered, 400: Bad Request, 401: Unauthorized	BearerAuth
/devices	GET	List all devices registered to the authenticated user	limit (integer, query), page (integer, query)	None	200: List of devices, 401: Unauthorized	BearerAuth
/devices/{deviceId}	GET	Get device status and metadata for a user- owned device	deviceId (string, path)	None	200: Device details, 401: Unauthorized, 404: Not Found	BearerAuth
/devices/{deviceId}/predictive- maintenance	GET	Predict potential device malfunctions	deviceId (string, path)	None	200: Maintenance recommendation, 404: Not Found, 401: Unauthorized	BearerAuth
/users/login	POST	User login	None	username (string), password (string)	200: Authenticated successfully, 400: Bad Request	None
/devices/{deviceId}/commands	POST	Send command to a user-owned device	deviceId (string, path)	command (string), parameters (object: value)	200: Command sent, 401: Unauthorized, 404: Not Found	BearerAuth
/devices/{deviceId}/usage	GET	Get usage data for a user-owned device	deviceId (string, path), startDate (date, query), endDate (date, query)	None	200: Usage data, 401: Unauthorized, 404: Not Found	BearerAuth
/analytics/report	POST	Generate usage report for specific	None	startDate (date), endDate (date),	200: Report generated, 400: Bad Request, 401:	BearerAuth

Endpoint	Method	Summary	Parameters	Request Body	Responses	Security
		devices		deviceIds (array of strings)	Unauthorized, 404: Not Found	
/analytics/environmental- footprint	GET	Get user's environmental and usage footprint	userId (string, query)	None	200: Environmental footprint data	None
/devices/groups	POST	Create a device group for batch control	None	groupName (string), devices (array of strings)	201: Group created successfully	None