

**OCF “Essen” – upgrade airflow to change the value of automode – Data Model WG CR
2901**

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1.1 Air Flow

1.1.1 Introduction

This Resource describes Properties associated with air flow.

The Property "supporteddirections" is the set of valid values for the direction property for a particular instance of this Resource Type.

The Property "direction" is the directionality of the air flow if applicable, if Property "supporteddirections" is also present it must be a value from that set.

The values of Property "direction" are dependent on the capabilities of the unit.

The Property "speed" is an integer representing the current speed level for the unit.

The Property "range" is an array of the min,max values for the speed level. If not present the "range" defaults to [0,100].

Property "automode" is the status of the automode feature; Off means automode is not enabled, On means automode is active and the speed is automatically controlled by the Device.

1.1.2 Example URI

/AirFlowResURI

1.1.3 Resource type

The Resource Type is defined as: "oic.r.airflow".

1.1.4 OpenAPI 2.0 definition

```
{
  "swagger": "2.0",
  "info": {
    "title": "Air Flow",
    "version": "20190215",
    "license": {
      "name": "OCF Data Model License",
      "url":
"https://github.com/openconnectivityfoundation/core/blob/e28a9e0a92e17042ba3e83661e4c0fbce8bdc4b
a/LICENSE.md",
      "x-copyright": "copyright 2016-2017, 2019 Open Connectivity Foundation, Inc. All rights
reserved."
    },
    "termsOfService": "https://openconnectivityfoundation.github.io/core/DISCLAIMER.md"
  },
  "schemes": ["http"],
  "consumes": ["application/json"],
  "produces": ["application/json"],
  "paths": {
    "/AirFlowResURI" : {
      "get": {
        "description": "This Resource describes Properties associated with air flow.\n\nThe
Property \"supporteddirections\" is the set of valid values for the direction property for a
particular instance of this Resource Type.\n\nThe Property \"direction\" is the directionality of
the air flow if applicable, if Property \"supporteddirections\" is also present it must be a
value from that set.\n\n The values of Property \"direction\" are dependent on the capabilities of
the unit.\n\nThe Property \"speed\" is an integer representing the current speed level for the
unit.\n\nThe Property \"range\" is an array of the min,max values for the speed level. If not
present the \"range\" defaults to [0,100].\n\n Property \"automode\" is the status of the automode
feature; Off means automode is not enabled, On means automode is active and the speed is
automatically controlled by the Device.",
        "parameters": [
          { "$ref": "#/parameters/interface" }
        ],
        "responses": {
          "200": {
            "description": "",
            "x-example":
{
              "rt": ["oic.r.airflow"],
              "if": ["oic.if.a", "oic.if.baseline"],
            }
          }
        }
      }
    }
  }
}
```

```

        "supporteddirections": ["left", "right", "centre"],
        "direction": "left",
        "speed": 5,
        "range": [1, 7],
        "automode": "Off"
    },
    "schema": { "$ref": "#/definitions/AirFlow" }
}
},
"post": {
    "description": "When \"automode\" is set to true, \"direction\" and \"speed\" are not
utilized by the device.",
    "parameters": [
        { "$ref": "#/parameters/interface" },
        {
            "name": "body",
            "in": "body",
            "required": true,
            "schema": { "$ref": "#/definitions/AirFlow" },
            "x-example":
                {
                    "direction": "right",
                    "speed": 3
                }
        }
    ],
    "responses": {
        "200": {
            "description": "",
            "x-example":
                {
                    "direction": "right",
                    "speed": 3
                },
            "schema": { "$ref": "#/definitions/AirFlow" }
        },
        "403": {
            "description": "This response is generated by the OCF Server when the client
sends:\n An UPDATE with an invalid Property value for direction.\n An UPDATE with an out of
range property value for speed.\nThe server may respond with the current resource
representation.\n",
            "x-example":
                {
                    "supporteddirections": ["left", "right", "centre"],
                    "direction": "right",
                    "speed": 3
                },
            "schema": { "$ref": "#/definitions/AirFlow" }
        }
    }
}
}
},
"parameters": {
    "interface": {
        "in": "query",
        "name": "if",
        "type": "string",
        "enum": ["oic.if.a", "oic.if.baseline"]
    }
},
"definitions": {
    "AirFlow": {
        "properties": {
            "rt": {
                "description": "The Resource Type",
                "items": {
                    "enum": ["oic.r.airflow"],
                    "maxLength": 64,
                    "type": "string"
                }
            }
        }
    }
}

```

```

    },
    "minItems": 1,
    "uniqueItems": true,
    "readOnly": true,
    "type": "array"
  },
  "speed" : {
    "description": "The current speed level.",
    "type": "integer"
  },
  "direction" : {
    "description": "The directionality of the air flow, a value indicated by
    \"supporteddirections\".",
    "type": "string"
  },
  "automode" : {
    "description": "The status of the automode feature, if on speed is set by the
    Device.",
    "enum": [
      "On",
      "Off"
    ],
    "type": "string"
  },
  "supporteddirections" : {
    "description": "The array of possible direction settings for this instance of the
    Resource Type.",
    "items": {
      "minItems": 1,
      "type": "string",
      "uniqueItems": true
    },
    "readOnly": true,
    "type": "array"
  },
  "n": {
    "$ref":
    "https://openconnectivityfoundation.github.io/core/schemas/oic.common.properties.core-
    schema.json#/definitions/n"
  },
  "id": {
    "$ref":
    "https://openconnectivityfoundation.github.io/core/schemas/oic.common.properties.core-
    schema.json#/definitions/id"
  },
  "range": {
    "$ref":
    "https://openconnectivityfoundation.github.io/IoTDataModels/schemas/oic.baseresource.properties-
    schema.json#/definitions/range_integer"
  },
  "step": {
    "$ref":
    "https://openconnectivityfoundation.github.io/IoTDataModels/schemas/oic.baseresource.properties-
    schema.json#/definitions/step_integer"
  },
  "if": {
    "description": "The OCF Interface set supported by this Resource.",
    "items": {
      "enum": [
        "oic.if.a",
        "oic.if.baseline"
      ],
      "type": "string"
    },
    "minItems": 2,
    "uniqueItems": true,
    "readOnly": true,
    "type": "array"
  }
},
"type": "object",

```

```

    "required": ["speed"]
  }
}
}

```

1.1.5 Property definition

<Table Reference Here> defines the Properties that are part of the "oic.r.airflow" Resource Type.

Table 1 – The Property definitions of the Resource with type "rt" = "oic.r.airflow".

Property name	Value type	Mandatory	Access mode	Description
rt	array: see schema	No	Read Only	The Resource Type
id	multiple types: see schema	No	Read Write	
speed	integer	Yes	Read Write	The current speed level.
step	multiple types: see schema	No	Read Write	
automode	string	No	Read Write	The status of the automode feature, if on speed is set by the Device.
supporteddirections	array: see schema	No	Read Only	The array of possible direction settings for this instance of the Resource Type.
range	multiple types: see schema	No	Read Write	
if	array: see schema	No	Read Only	The OCF Interface set supported by this Resource.
n	multiple types: see schema	No	Read Write	
direction	string	No	Read Write	The directionality of the air flow, a value indicated by "supporteddirections".

1.1.6 CRUDN behaviour

<Table Reference Here> defines the CRUDN operations that are supported on the "oic.r.airflow" Resource Type.

Table 2 – The CRUDN operations of the Resource with type "rt" = "oic.r.airflow".

Create	Read	Update	Delete	Notify
	get	post		observe