Typical properties of biodegradable M·VERA® injection moulding compounds

	Unit	M·VERA® GP1005 (B0001) ^a	M·VERA® GP1012 (B0254)ª	M-VERA® GP1015 (B0071)	M·VERA® GP1025 (B0147) ^a	M·VERA® GP1028 (B0249) ^a	M-VERA® GP1045 (B0217)
Food contact approval EU 10/2011	-	√kc	√ kc	√c	√ c	√c	√ kc
Certificates	-	-	OK biodegrad- able SOIL; OK compost HOME	OK compost INDUSTRIAL	OK compost INDUSTRIAL	OK compost INDUSTRIAL ^b	OK biodegrad- able SOIL; OK compost HOME
Renewable content in the polymer	%	~50	~100	~70	~100	~50	~100
Density	g/cm³	1.44	1.22	1.44	1.49	1.31	1.20
MVR (190 °C/2.16 kg)	cm³/10 min	12	9e	10	11	19	9e
Tensile modulus ^f	MPa	1,190	1,750	4,100	8,480	2,800	1.500
Tensile strength ^f	MPa	26	25	40	65	42	26
Yield strength ^f	MPa	26	25	41	n.d.	42	26
Elongation at yield ^f	%	7	3.7	2	n.d.	2.5	3
Elongation at break ⁶	%	20	4	4.7	1.3	20	5.5
Charpy notched impact strength ^g	kJ/m²	3.2	2.2	3.5	2	8	2
Charpy impact strength	kJ/m²	46	12	50	19	180	14
HDT/B (ISO 75/B)	°C	95	104	50-115 ^h	50-115 ^h	50-80 ^h	98
Flammability (ISO 3795/DIN 75200)	mm/min	-	-	-	-	-	-

^a product in development, preliminary data ^b certification in progress ^cavailable on request ^c (160/5) ^f according ISO 527-1/-2 ^g ISO 179-1/1eA ^f ISO 179-1/1eU ^b depending on mould temperature and annealing process afterwards ^f certification possible

The information given here is only valid for M-VERA® grades in their original packaging, sold by BIO-FED® and/or its authorized partners. If M-VERA® grades are mixed in any capacity with foreign material, beside masterbatches recommended by BIO-FED®, BIO-FED® declines any further responsibility, M-VERA® grades shall be stored in dry, closed rooms in closed packaging in original state. For keeping the product properties, the material must be protected against direct sun and the temperature must not exceed 50 °C at any time during transport and storage. M·VERA® grades have a remaining shelf life of six (6) months at room temperature (23 °C) from the delivery date. We recommend that products made of M-VERA® grades shall be stored under same conditions. All M-VERA® products listed here can be colored with AF-Eco® masterbatches from AF-COLOR, also certified according to EN 13432. Please note that the use of AF-Eco® might influence the mechanical and/or optical properties of the final part.



BIO-FED

Member of the Feddersen Group

BioCampus Cologne · Nattermannallee 1

50829 Cologne · Germany Phone: +49 221 88 88 94-00 +49 221 88 88 94-99

info@bio-fed.com · www.bio-fed.com

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^k food contact limitations, for more informations please contact BIO-FED n.d. = not determined