

Suitability of Pumps for BubbleBead Filters – 2010 (UK)

Submersible Pumps (Discontinued models in grey)

BBF Model and max flow <i>litres per minute</i>	Pump Max Head m	Pump Output @ 2m head LPM	BBF XS1 60 lpm	BBF 1.5 95 lpm	BBF XS2 115 lpm	BBF 3 190 lpm	BBF XS4 245 lpm	BBF 5 250 lpm	BBF 7 300 lpm	BBF 9 375 lpm
OASE										
Nautilus 250 in strainer basket	4.5	55	YES	Low Flow	NO	NO	NO	NO	NO	NO
Nautilus 350 in strainer basket	5.0	100	High Flow	YES	Low Flow	NO	NO	NO	NO	NO
Nautilus 400 in strainer basket Bypass required!	7.0	125	NO	High Flow	YES + Bypass	Low Flow	NO	NO	NO	NO
Nautilus 450 in strainer basket Bypass required!	7.5	145	NO	High Flow	High Flow + Bypass	Low Flow	Low Flow	NO	NO	NO
Neptun 6000 with strainer	5.0	65	YES	Low Flow	NO	NO	NO	NO	NO	NO
Neptun 9000 with strainer	6.0	115	High Flow	YES	YES	Low Flow	NO	NO	NO	NO
Neptun 12000 with strainer Bypass required!	7.0	155	NO	NO	High Flow + Bypass	Low Flow	NO	NO	NO	NO
Profinaut 21 * extra strainer! Bypass required!	9.6	320	NO	NO	NO	NO	*High Flow + Bypass	High Flow*	YES*	Low Flow*
Profinaut 27 * extra strainer! Bypass required!	10.0	400	NO	NO	NO	NO	NO	NO	*High Flow + Bypass	YES* + Bypass
Profinaut 40 * extra strainer! Bypass required!	11.0	580	NOW	NO	NOW	NO	NOW	NO	NO	*High Flow + Bypass
Aquamax Eco 8000 * extra strainer!	4.0	80	High Flow*	Low Flow*	NO	NO	NO	NO	NO	NO
Aquamax Eco 12000 * extra strainer!	5.2	120	NO	High Flow*	YES*	NO	NO	NO	NO	NO
Aquamax Eco 16000 * extra strainer!	5.6	170	NO	NO	High Flow*	Low Flow*	NO	NO	NO	NO
Promax 30000 * extra strainer!	5.0	260	NO	NO	NO	High Flow *	YES *	YES *	Low Flow*	NO
Profimax 20000 * extra strainer! Bypass required!	8.0	280	NO	NO	NO	NO	YES* + Bypass	YES*	Low Flow*	Low Flow*
Profimax 30000 *extra strainer! Bypass required!	8.5	420	NO	NO	NO	NO	NO	NO	High Flow*	YES*
Profimax 40000 *extra strainer! Bypass required!	10	600	NO	NO	NO	NO	NO	NO	NO	NO
<p>* extra strainer – the fitted pump strainer is insufficient, use a further pre-filter to capture oversized solids (over 2mm)</p> <p>Bypass required -- a suitable pressure-release bypass is essential when using pumps with a maximum head of 10m or more (7m for XS models). When a bypass is fitted, pumps with heads of up to 12m may be used with BBF filters, (10m with XS models see notes on page 5).</p> <p>W Use of overpressure pumps voids your guarantee (see guidance notes on page 5)</p>										

Suitability of Pumps for BubbleBead Filters – 2010 (UK)

OASE - Discontinued models										
BBF Model and max flow litres per minute	Pump Max Head m	Pump Output @ 2m head LPM	BBF XS1 60 lpm	BBF 1.5 95 lpm	BBF XS2 115 lpm	BBF 3 190 lpm	BBF XS4 245 lpm	BBF 5 250 lpm	BBF 7 300 lpm	BBF 9 375 lpm
Pump models										
Nautilus 6000 with strainer	5.1	75	YES	Low Flow	Low Flow?	NO	NO	NO	NO	NO
Nautilus 8000 with strainer	6.1	110	High Flow	YES	Low Flow	Low Flow?	NO	NO	NO	NO
Nautilus 12000 with strainer Bypass required!	7.7	175	NO	High Flow	High Flow + Bypass	YES	Low Flow + Bypass	Low Flow	NO	NO
Atlantis 75 with strainer	4.5	55	YES	Low Flow	NO	NO	NO	NO	NO	NO
Atlantis 150 with strainer Bypass required!	8.0	100	High Flow + Bypass	YES	YES + Bypass	Low Flow	NO	NO	NO	NO
Atlantis 200 Bypass required!	10.2	285	NOW	NO	NOW	NO	NOW	YES + Bypass	YES + Bypass	NO
Atlantis 85 * extra strainer!	4.0	60	YES *	Low Flow *	NO	NO	NO	NO	NO	NO
Atlantis 110 * extra strainer!	5.0	90	High Flow *	YES *	Low Flow *	NO	NO	NO	NO	NO
Atlantis 130 * extra strainer!	5.5	120	NO	High Flow *	YES *	Low Flow *	NO	NO	NO	NO
Aquamax 15000 * extra strainer!	5.0	150	NO	High Flow *	YES *	Low Flow *	NO	NO	NO	NO
Hozelock										
Cascade 5500 with strainer	4.9	54	YES	Low Flow	NO	NO	NO	NO	NO	NO
Cascade 7000 with strainer	5.5	68	YES	Low Flow	NO	NO	NO	NO	NO	NO
Titan 8000 *strainer at 2mm!	4.0	73	YES *	Low Flow *	Low Flow *	NO	NO	NO	NO	NO
Titan 12000 new *strainer at 2mm!	4.0	100	High Flow *	YES *	Low Flow *	NO	NO	NO	NO	NO
Titan 15000 new *strainer at 2mm!	4.2	125	Too High *	High Flow *	YES *	NO	NO	NO	NO	NO
Prima XL 5000 * extra strainer!	5.0	63	YES *	Low Flow *	Low Flow *	NO	NO	NO	NO	NO
Prima XL 6000 * extra strainer!	6.0	80	High Flow *	Low Flow *	Low Flow *	NO	NO	NO	NO	NO
Prima XL 9000 * extra strainer! Bypass required!	7.5	140	NO	High Flow *	*High Flow + Bypass	Low Flow *	NO	NO	NO	NO
Prima XL 15000 * extra strainer & Bypass required!	9.6	240	NO	NO	NO	High Flow *	YES + Bypass	YES*	Low Flow *	NO
Little Giant										
WGP-65 * extra strainer!	6.1	80	High Flow*	Low Flow*	Low Flow*	NO	NO	NO	NO	NO
WGP-75 * extra strainer! Bypass required!	7.5	130	NO	High Flow*	YES* + Bypass	Low Flow	NO	NO	NO	NO
WGP-95 * extra strainer! Bypass required!	8.1	215	NO	NO	NO	YES*	*Low Flow + Bypass	Low Flow*	Low Flow*	NO
See general notes on front page and guidance notes on page 5										

Suitability of Pumps for BubbleBead Filters – 2010 (UK)

Submersible pumps (cont.)

BBF Model and max flow <i>litres per minute</i>	Pump Max Head m	Pump Output @ 2m head LPM	BBF XS1 60 lpm	BBF 1.5 95 lpm	BBF XS2 115 lpm	BBF 3 190 lpm	BBF XS4 245 lpm	BBF 5 250 lpm	BBF 7 300 lpm	BBF 9 375 lpm
Pump models										
Blagdon										
P8000 with strainer	4.4	80	High Flow	Low Flow	Low Flow	NO	NO	NO	NO	NO
P9000 with strainer	4.6	85	High Flow	Low Flow	Low Flow	NO	NO	NO	NO	NO
Torrent 8000 * extra strainer!	5.5	105	High Flow *	YES *	Low Flow *	Low Flow *	NO	NO	NO	NO
Torrent 10500 * extra strainer Bypass required!	9.5	155	NO	NO	*High Flow + Bypass	Low Flow*	*Low Flow + Bypass	Low Flow*	NO	NO
Lotus/Trident Classic/Maximus										
5000 * extra strainer!	5.2	62	YES *	Low Flow *	Low Flow *	NO	NO	NO	NO	NO
7500 * extra strainer!	5.2	90	High Flow *	YES *	Low Flow *	NO	NO	NO	NO	NO
9000 * extra strainer!	5.5	106	High Flow *	YES *	Low Flow *	Low Flow *	NO	NO	NO	NO
Olympus 6500 * extra strainer!	4.1	90	High Flow *	YES *	Low Flow *	NO	NO	NO	NO	NO
Olympus 10000 * extra strainer!	5.2	150	NO	High Flow *	High Flow *	Low Flow *	NO	NO	NO	NO
Fish Mate										
9000 with fine strainer!	4.0	65	YES	Low Flow	NO	NO	NO	NO	NO	NO
12000 with fine strainer!	5.5	115	High Flow	YES	YES	Low Flow	NO	NO	NO	NO
12000XS with fine strainer! Bypass required!	8.0	135	NO	High Flow	High Flow + Bypass	Low Flow	NO	NO	NO	NO
15000 with fine strainer!	6.5	150	NO	High Flow	High Flow	Low Flow	Low Flow ?	NO	NO	NO
Heissner										
P8000 * extra strainer!	6.1	115	High Flow *	YES *	YES *	Low Flow *	NO	NO	NO	NO
P10000 * extra strainer! Bypass required!	8.3	155	NO	NO	*High Flow + Bypass	Low Flow *	*Low Flow + Bypass	Low Flow*	NO	NO
P13000 * extra strainer! Bypass required!	9.0	205	NO	NO	NO	YES *	*Low Flow + Bypass	Low Flow *	NO	NO
P18000 * extra strainer! Bypass required!	7.2	215	NO	NO	NO	YES *	*Low Flow + Bypass	Low Flow *	Low Flow*	NO
See general notes on front page and guidance notes on page 5										

Suitability of Pumps for BubbleBead Filters – 2010 (UK)

Surface Pumps

BBF Model and max flow <i>litres per minute</i>	Pump Max Head m	Output @ 2m (4m) head LPM	BBF XS1 60 lpm	BBF 1.5 95 lpm	BBF XS2 115 lpm	BBF 3 190 lpm	BBF XS4 245 lpm	BBF 5 250 lpm	BBF 7 300 lpm	BBF 9 375 lpm
Pump models										
Yamitsu (*outputs quoted at 1.5m head)										
Wattpump 250 with strainer	5.25	160*	NO	NO	NO	Low Flow	NO	NO	NO	NO
Wattpump 400 with strainer	7.5	215*	NO	NO	NO	High Flow	Low Flow. Bypass	Low Flow	Low Flow	NO
ITT/Yamitt										
AG8 with strainer Bypass required!	8.0	135 (115)	NO	High Flow	High Flow + Bypass	Low Flow	NO	NO	NO	NO
AG10 with strainer Bypass required!	9.5	165 (135)	NOW	High Flow. Bypass	NOW	Low Flow. Bypass	NOW	Low Flow ? Bypass	NO	NO
AG14 with strainer Bypass required!	11.5	220 (190)	NOW	NOW	NOW	YES Bypass	NOW	Low Flow Bypass	Low Flow Bypass	NOW
AG16/AV75+ wOverpressure!	over 12m		NOW	NOW	NOW	NOW	NOW	NOW	NOW	NOW
J100 / J150 J200 / J250 wOverpressure!	over 17m		NOW	NOW	NOW	NOW	NOW	NOW	NOW	NOW
Speck/Badu										
Magic 4 with strainer Bypass required!	10.7	115	NOW	YES Bypass	NOW	Low Flow. Bypass	NOW	NO	NO	NO
Magic 6 with strainer Bypass required!	12	150	NOW	High Flow. Bypass	NOW	Low Flow. Bypass	NOW	NO	NO	NO
Magic 8 /11 wOverpressure!	over 14m		NOW	NOW	NOW	NOW	NOW	NOW	NOW	NOW
Top 8 / 12 / 14 + wOverpressure!	over 14.5m		NOW	NOW	NOW	NOW	NOW	NOW	NOW	NOW
HydroProGreen										
HPS25 with strainer Bypass required!	11.0?	205	NOW	NO	NOW	YES Bypass	NOW	Low Flow Bypass	NO	NO
HPS33 with strainer Bypass required!	12.0	280	NOW	NO	NOW	High Flow. Bypass	NOW	YES Bypass	Low Flow. Bypass	Low Flow. Bypass
HPS 50 – 150 wOverpressure!	over 13m		NOW	NOW	NOW	NOW	NOW	NOW	NOW	NOW
Sequence										
12000S insufficient head	3.0		NO	NO	NO	NO	NO	NO	NO	NO
15000S	4.5	210	NO	NO	NO	YES	Low Flow	Low Flow	Low Flow	NO
18000S	4.5	255	NO	NO	NO	High Flow	YES	YES	Low Flow	NO
1/8 HP/11000 with strainer	4.6	130	NO	High Flow	YES	Low Flow	NO	NO	NO	NO
1/6 HP/12000 with strainer	4.6	190	NO	High Flow	High Flow	YES	Low Flow	Low Flow	NO	NO
¼ HP/13000 with strainer	5.2	225	NO	NO	NO	High Flow.	YES	Low Flow	Low Flow	NO
¼+ HP/15000 with strainer	5.2	265	NO	NO	NO	High Flow	YES	YES	Low Flow	Low Flow

See general notes on front page and guidance notes on page 5

Suitability of Pumps for BubbleBead Filters – 2010 (UK)

Notes:

* extra strainer

- the fitted pump strainer is insufficient, fit a further pre-filter to prevent oversized solids (over 2mm) entering the Bubblebead filter and clogging inlet strainers.
- Pumps **must** be used with a prefilter or sieve capable of removing particles 2mm or larger!

Bypass required!

- Fit a bypass if using high-head pumps over 10m head (7m for BBF-XS models).
- A **suitable** pressure release bypass allows pumps with heads of up to 12m to be used with BBF filters (up to 10m with XS models).

A suitable bypass is a 1½” pressure release valve of 0.7bar/10psi or less, connecting to unrestricted pipework of at least 1½” bore. The excess flow can be directed back to the pond. Bypasses give a measure of protection for slightly over-pressured pumps and also help to relieve the pressure surge following pump startup.

See the User’s Guide for further information on high-pressure use or where backpressure could occur e.g. in pipe manifolds on the filter outlet. These current recommendations supercede all previous guidance.

WUse of overpressure pumps voids your guarantee!

BubbleBead filters are specially designed to run with energy efficient pumps with lower to medium heads. Such pumps will save many hundreds of pounds in running costs compared to high pressure/high head pumps. BubbleBead filters function best with pumps whose head exceeds 4.0m. Ask the distributor if in doubt.

- Performance figures taken from manufacturers’ information.
- Pump flows shown at a 2 metre head for typical achievable flow using large bore pipework.
- If the filter outlet is much higher than the pond, a more powerful pump will be required.
- Oversized pumps (‘High Flow’) may require a restrictor or bypass on the pump.
- Where noted as ‘Low flow’, turnover may still be adequate in smaller volume ponds.
- Listing does not infer recommendation for any particular model or brand. Other brands of similar performance may also be suitable. If a suggested pump proves unsuitable in practice, please feedback and we will update this list.

Timers:

When using timers on auto BubbleBeads, check that they have adequate ‘inductive loading’ to control pumps. 7-Day timers can be programmed to carry out additional backwashes once per week. Many timers are unsuited to control of fluorescent UV units. Contact a qualified electrician if in doubt.

Good system design:

Make allowances for equipment failures: A second pump or an air-pump backup can supply essential aeration and circulation should your main pump fail or require maintenance. Wiring pumps through separate trip switches can prevent complete system shutdown if only one piece of equipment should fail. Careful plumbing design can prevent the pool draining completely should a pump joint or pipe-return spring a leak. Auto top-ups and low level warnings can also be useful. Take advice from your local dealer.