

# Lab recharge 2020

Filtration solutions for applied markets



Industrial



Environmental



Food and beverage



Agriculture



Collection



Preparation



Incubation



Analysis



# Table of contents

|                                     |           |                                    |           |
|-------------------------------------|-----------|------------------------------------|-----------|
| <b>Lab filtration workflow.....</b> | <b>3</b>  | <b>Food and beverage .....</b>     | <b>12</b> |
| <b>Product index.....</b>           | <b>4</b>  | Fat and protein analysis           |           |
| <b>Industrial .....</b>             | <b>8</b>  | Moisture testing                   |           |
| Emissions testing                   |           | Gravimetric analysis               |           |
| Ignition testing                    |           | Trace elements analysis            |           |
| Bioethanol production               |           | Microbiology testing               |           |
| Gravimetric testing                 |           | Beer brewing                       |           |
| Cement testing                      |           | Sugar and honey sample preparation |           |
| Asphaltene testing (refinery)       |           | Raw milk analysis                  |           |
| Semiconductor production            |           | <b>Agriculture .....</b>           | <b>14</b> |
| Analytical testing                  |           | Soil testing                       |           |
| <b>Environmental.....</b>           | <b>10</b> | Germination analysis               |           |
| Water monitoring                    |           | Seed testing                       |           |
| Soil testing                        |           | Pesticide testing                  |           |
| Air monitoring                      |           | <b>How we give back .....</b>      | <b>17</b> |
| General analysis                    |           |                                    |           |
| Asbestos testing                    |           |                                    |           |
| Nuclear radiation                   |           |                                    |           |



## Whatman™ filtration guide

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# Filtration workflow simplified



# Product index

| Item number | Description  | Pack size | Industrial |             |            |          |
|-------------|--|-----------|------------|-------------|------------|----------|
|             |  |           | Collection | Sample prep | Incubation | Analysis |
| 2300-916    | Benchkote™ Surface Protector, Sheets, 460 × 570 mm                           | 50/pk     | •          |             |            |          |
| 2814-199    | Glass Thimbles HP 19 × 90 mm   | 25/pk     | •          |             |            |          |
| 10350240    | Grade 603 standard cellulose extraction thimble 33 × 80 mm, thickness 1.5 mm | 25/pk     | •          |             |            |          |
| 28932358    | Vivaspin™ 20, 3 kDa MWCO PES   | 12/pk     |            | •           |            |          |
| 28932362    | Vivaspin 20, 50 kDa MWCO PES   | 12/pk     |            | •           |            |          |
| 2105-841    | 105 Sheets, Lens Cleaning Tissue, 100 × 150 mm, 25 wallets of 25 sheets      | 25/pk     |            | •           |            |          |
| 9910-1304   | Whatman Uniflo™ 13 mm 0.45 µm Nylon  | 500/pk    |            | •           |            |          |
| 9909-2504   | Whatman Uniflo 25 mm 0.45 µm PVDF  | 500/pk    |            | •           |            |          |
| 9912-2504   | Whatman Uniflo 25 mm 0.45 µm PES   | 500/pk    |            | •           |            |          |
| 9912-1302   | Whatman Uniflo 13 mm 0.2 µm PES  | 500/pk    |            | •           |            |          |
| 9911-2502   | Whatman Uniflo 25 mm 0.2 µm PTFE   | 500/pk    |            | •           |            |          |
| 9913-2502   | Whatman Uniflo 25 mm 0.2 µm PVDF S   | 45/pk     |            | •           |            |          |
| 9916-1302   | Whatman Uniflo 13 mm 0.2 µm PES S  | 100/pk    |            | •           |            |          |
| 9920-1304   | Whatman Uniflo 13 mm 0.45 µm H-PTFE <b>NEW</b>                               | 100/pk    |            | •           |            |          |
| 6870-1304   | Whatman GD/X™ 13 mm 0.45 µm Nylon  | 150/pk    |            | •           |            |          |
| 6872-2504   | Whatman GD/X 25 mm 0.45 µm PVDF  | 150/pk    |            | •           |            |          |
| 6876-2502   | Whatman GD/X 25 mm 0.2 µm PES  | 150/pk    |            | •           |            |          |
| 6878-2504   | Whatman GD/X 25 mm 0.45 µm PP  | 150/pk    |            | •           |            |          |
| 6887-2502   | Whatman GD/X 25 mm 0.2 µm RC   | 150/pk    |            | •           |            |          |
| 6882-2504   | Whatman GD/X 25 mm 0.45 µm RC  | 150/pk    |            | •           |            |          |
| 6883-2504   | Whatman GD/X 25 mm 0.45 µm RC  | 1500/pk   |            | •           |            |          |
| 6872-1304   | Whatman GD/XP 13 mm 0.45 µm PVDF   | 150/pk    |            | •           |            |          |
| 6972-2504   | Whatman GD/XP 25 mm 0.45 µm PVDF   | 150/pk    |            | •           |            |          |
| UN203APEPES | Mini-UniPrep™ Amber 0.2 µm PES   | 100/pk    |            | •           |            | •        |
| UN203APUORG | Mini-UniPrep Amber 0.45 µm PTFE  | 100/pk    |            | •           |            | •        |
| UN203NPERC  | Mini-UniPrep 0.2 µm RC   | 100/pk    |            | •           |            | •        |
| UN203NPUGMF | Mini-UniPrep 0.45µm GMF  | 100/pk    |            | •           |            | •        |
| UN203NPUORG | Mini-UniPrep 0.45 µm PTFE  | 100/pk    |            | •           |            | •        |
| UN203NPUPP  | Mini-UniPrep 0.45 µm PP  | 100/pk    |            | •           |            | •        |
| UN203NPURC  | Mini-UniPrep 0.45 µm RC  | 100/pk    |            | •           |            | •        |
| UN503NPERC  | Mini-UniPrep 0.2 µm RC   | 1000/pk   |            | •           |            | •        |
| UN503NPURC  | Mini-UniPrep 0.45 µm RC  | 1000/pk   |            | •           |            | •        |
| US503NPEORG | Mini UniPrep Slit Septum 0.2 µm PTFE   | 1000/pk   |            | •           |            | •        |
| 2600-201A   | Acid Alkali Test Papers, Reel, Litmus Blue, 7 mm × 5 m                       | 1/pk      |            | •           |            | •        |
| 2710        | Polycap HD 75 0.45 µm  | 5/pk      |            | •           |            |          |
| 2813        | Polycap HD 150 10 µm   | 5/pk      |            | •           |            |          |
| 6705-3602   | Polycap AS 36 0.2 µm   | 1/pk      |            | •           |            |          |
| 6722-5001   | Vacuguard 60 mm Disc   | 10/pk     |            |             |            | •        |
| 1822-047    | GF/C™ glass microfibre filter 47 mm  | 100/pk    |            |             |            | •        |
| 1822-090    | GF/C glass microfibre filter 90 mm   | 100/pk    |            |             |            | •        |
| 1822-150    | GF/C glass microfibre filter 150 mm  | 100/pk    |            |             |            | •        |
| 3822-047    | GF/C RTU, pre-weighed, 4.7 cm  | 100/pk    |            |             |            | •        |
| 3822-070    | GF/C RTU, preweighed, 7.0 cm   | 100/pk    |            |             |            | •        |
| 3822-090    | GF/C RTU, preweighed, 9.0 cm   | 100/pk    |            |             |            | •        |
| 2822-047    | GF/C, pre-rinsed and dried, 4.7cm  | 100/pk    |            |             |            | •        |
| 10313032    | 609 Kjeldahl Weighing Boat 55 × 10 × 10 mm                                   | 100/pk    | •          |             |            | •        |

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# Product index

| Item number | Description   | Pack size | Industrial |             |            |          |
|-------------|---|-----------|------------|-------------|------------|----------|
|             |   |           | Collection | Sample prep | Incubation | Analysis |
| AV115NPEORG | Autovial™ 5 ml 0.2 µm PTFE                              | 50/pk     |            | •           |            |          |
| AV115NPUORG | Autovial 5 ml 0.45 µm PTFE                              | 50/pk     |            | •           |            |          |
| AV125EAQU   | Autovial 12 ml 0.2 µm PVDF                              | 50/pk     |            | •           |            |          |
| AV125NPUAQU | Autovial 12 ml 0.45 µm PVDF with no prefilter           | 50/pk     |            | •           |            |          |
| 6753-2502   | Puradisc 25 mm 0.2 µm Nylon                             | 1000/pk   |            | •           |            |          |
| 6753-2504   | Puradisc 25 mm 0.45 µm Nylon                            | 1000/pk   |            | •           |            |          |
| 6768-1302   | Puradisc 13 mm 0.2 µm Nylon                             | 2000/pk   |            | •           |            |          |
| 6768-1304   | Puradisc 13 mm 0.45 µm Nylon                            | 2000/pk   |            | •           |            |          |
| 6794-2502   | Puradisc 25 mm 0.2 µm PES                               | 1000/pk   |            | •           |            |          |
| 6794-2504   | Puradisc 25 mm 0.45 µm PES                              | 1000/pk   |            | •           |            |          |
| 6773-2504   | Puradisc 25 mm 0.45 µm H-PTFE <b>NEW</b>                | 200/pk    |            | •           |            |          |
| 6772-1302   | Puradisc 13 mm 0.2 µm H-PTFE <b>NEW</b>                 | 100/pk    |            | •           |            |          |
| 10463052    | SPARTAN™ 30 mm 0.45 µm RC                               | 500/pk    |            | •           |            |          |
| 10462655    | Puradisc AQUA 30 mm 0.45 µm CA                          | 100/pk    |            | •           |            |          |
| 1001-047    | Grade 1 filter 47 mm                                    | 100/pk    | •          | •           |            |          |
| 10380405    | Grade 1 FF quadrant 125 mm <b>NEW</b>                   | 500/pk    | •          | •           |            |          |
| 989710112   | Grade 1 pyramid 125 mm <b>NEW</b>                       | 1000/pk   | •          | •           |            |          |
| 990110116   | Grade 1 cone 110 mm <b>NEW</b>                          | 1000/pk   | •          | •           |            |          |
| 1002-150    | Grade 2 filter 150 mm                                   | 100/pk    | •          | •           |            |          |
| 1202-240    | Grade 2V folded filter 240 mm                           | 100/pk    | •          | •           |            |          |
| 1005-047    | Grade 5 filter 47 mm                                    | 100/pk    | •          | •           |            |          |
| 1872-047    | Grade 72 Circles 47 mm                                  | 100/pk    | •          | •           |            |          |
| 10311853    | Grade 597 ½ folded filter 320 mm                        | 100/pk    | •          | •           |            |          |
| 1855-090    | QM-C pre-fired 90 mm <b>NEW</b>                         | 100/pk    | •          |             |            | •        |
| 1855-047    | QM-C pre-fired 47 mm <b>NEW</b>                         | 100/pk    | •          |             |            | •        |
| 10342583    | Seed testing paper Yellow Grade 3645 110 × 170 mm       | 100/pk    |            |             | •          | •        |
| 10344672    | Seed testing paper White pleated Grade 3014 110 × 20 mm | 1000/pk   |            |             | •          | •        |
| 10345572    | Seed testing paper Grey pleated Grade 3236 110 × 20 mm  | 1000/pk   |            |             | •          | •        |
| 110605      | Nuclepore™ PC Membrane 25 mm 0.1 µm                     | 100/pk    | •          | •           |            | •        |
| 10417112    | Nuclepore PC Membrane 47 mm 0.4 µm                      | 100/pk    | •          | •           |            | •        |
| 10417612    | Cyclopore™ PC 47 mm 0.2 µm                              | 100/pk    | •          | •           |            | •        |
| 10417606    | Cyclopore PC 25 mm 0.2 µm                               | 100/pk    | •          | •           |            | •        |
| 1442-047    | Grade 42 filter 47 mm                                   | 100/pk    | •          | •           |            | •        |
| 10380004    | GR 40 filter FF QUADRANT 110 mm <b>NEW</b>              | 500/pk    | •          | •           |            | •        |
| 9892-128    | GR 40 filter 12.5 cm PYRAMID <b>NEW</b>                 | 1000/pk   | •          | •           |            | •        |
| 990010116   | GR 40 filter 110mm CONE <b>NEW</b>                      | 1000/pk   | •          | •           |            | •        |
| 10410212    | RC55 Membrane 47 mm 0.45 µm                             | 100/pk    | •          | •           | •          | •        |
| 10410312    | RC58 Membrane 47 mm 0.2 µm                              | 100/pk    | •          | •           | •          | •        |
| 7182-009    | Cellulose Nitrate membrane, White Plain, 90 mm 0.2 µm   | 25/pk     | •          | •           | •          | •        |
| 7184-004    | Cellulose Nitrate membrane, White Plain, 47 mm 0.45 µm  | 100/pk    | •          | •           | •          | •        |
| 7402-004    | Nylon membrane, White Plain, 47 mm 0.2 µm               | 100/pk    | •          | •           | •          | •        |
| 7404-009    | Nylon membrane, White Plain, 90 mm 0.45 µm              | 50/pk     | •          | •           | •          | •        |
| 10411116    | TE38 Membrane 90 mm 5 µm                                | 25/pk     | •          | •           | •          | •        |
| 10411211    | TE37 Membrane 47 mm 1 µm                                | 50/pk     | •          | •           | •          | •        |
| 10406812    | ME25 membrane, White/black grid 3.1 mm 47 mm 0.45 µm    | 100/pk    | •          | •           | •          | •        |

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## Applications

- Emissions testing
- Ignition testing
- Bioethanol production
- Gravimetric testing
- Cement testing
- Asphaltene testing (refinery)
- Semiconductor production
- Analytical testing

## Whatman PTFE membrane filters-TE range

Whatman PTFE membrane filters from GE Healthcare Life Sciences are chemically stable and inert, making them suitable for use with aggressive organic solvents, strong acids, and alkalis.

- The TE range features polypropylene support material for improved strength and handling.
- Temperature resistant up to 120°C.
- Can withstand aggressive solvents, liquids, and gases that damage other membranes.



## Polycap HD (heavy duty) capsule filter

Polycap HD capsule filter offers a broad range of particle size retention ratings and excellent filtrate purity with polypropylene filters (PP).

- Polypropylene filters support use with a broad range of solutions, pH solutions, and temperatures.
- Sturdy construction leads to high flow and high retention capacity.
- Can be autoclaved with steam at 121°C for 20 min.
- Manual vent with luer lock to bleed air from upstream or serve as an injection or sample port.



## Whatman Nuclepore and Cyclopore polycarbonate track-etched membranes

Nuclepore and Cyclopore track-etched hydrophilic membrane filters offer a highly defined pore size cutoff in the sub-micron range, enabling particle deformity measurement and capture of extremely small particles.





Industrial filtration requires accurate and reliable analytical results. We know that you depend on us to make sure your filtration step is efficient, reproducible, and preserves the integrity of your sample. Leave the filtration to us. We understand that quality matters.

### Collection

| Description   | Item     | Pack size |
|---|----------|-----------|
| Grade 609 Kjeldahl analysis weighing boat 55 × 10 × 10 mm | 10313032 | 100       |
| Benchkote sheets 46 × 57 cm                               | 2300-916 | 50        |
| Grade 2 filter 150 mm                                     | 1002-150 | 100       |
| Grade 2V folded filter 240 mm                             | 1202-240 | 100       |

### Sample prep

| Description                       | Item      | Pack size |
|-----------------------------------|-----------|-----------|
| Polycap HD 75 0.45 µm             | 2710      | 5         |
| Polycap HD 150 10 µm              | 2813      | 5         |
| Whatman GD/X 25 0.2 µm RC         | 6888-2502 | 1500      |
| Puradisc 25 0.2 µm PES            | 6794-2502 | 1000      |
| Whatman Uniflo 25 mm 0.45 µm PVDF | 9909-2504 | 500       |

### Analysis

| Description               | Item     | Pack size |
|---------------------------|----------|-----------|
| Nuclepore PC 25 mm 0.1 µm | 110605   | 100       |
| Nuclepore PC 47 mm 0.4 µm | 10417112 | 100       |
| Cyclopore PC 25 mm 0.2 µm | 10417606 | 100       |
| Cyclopore PC 47 mm 0.4 µm | 10417612 | 100       |

For a complete list of products for this market application, see the Product Index pages: 4-7



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## Whatman: over 250 years of history



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## Applications

- Water monitoring
- Soil testing
- Air monitoring
- General analysis
- Asbestos testing
- Nuclear radiation

## Whatman high-purity glass and cellulose Soxhlet extraction thimbles

Whatman 100% borosilicate glass microfibre (HP-GF) thimbles are designed to fit most Soxhlet extraction units. They are well-suited to pollution monitoring when analysis of hot and acidic gases is required. Extraction thimbles made from high-quality cellulose are also available in a range of sizes.



## Whatman QM-C quartz filters **NEW**

High-purity and high-temperature resistance quartz filter paper QM-C for air particulate testing.

Whatman quartz filter paper QM-C is designed for heavy metal/inorganic chemical analysis but also excellent for organic chemical analysis in air monitoring. The suitable applications include gravimetric analysis of PM2.5/PM10/TSP, heavy metal and PAHs, PCB and black carbon analysis etc. Due to its high-quality raw material, QM-C has excellent performance for black carbon analysis at 1200°C.



More information can be found [here](#).



## Whatman Grade GF/C RTU glass microfibre filters, Ready-to-Use

Whatman Grade GF/C ready-to-use (RTU) filters are the time-saving version of our GF/C filters, which are widely used for total suspended solids analysis.

- GF/C RTU for suspended and dissolved solids.



**Watch our video:** Environmental testing through the years.  
Click [here](#) to watch



Accurate and reliable analytical results are important when monitoring air, water, and soil. We know that you depend on us to make sure your filtration step is efficient, reproducible, and preserves the integrity of your sample. Whether you are using one of our glass papers, syringe filters, or other Whatman products, you can count on us to understand that quality matters.

## Collection

| Description  | Item     | Pack size |
|--|----------|-----------|
| Grade 609 Kjeldahl analysis weighing boat 55 × 10 × 10 mm                    | 10313032 | 100       |
| Grade 603 standard cellulose extraction thimble 33 × 80 mm, thickness 1.5 mm | 10350240 | 25        |
| QM-C pre-fired 90 mm <b>NEW</b>  | 1855-090 | 100       |

## Sample prep

| Description                      | Item      | Pack size |
|----------------------------------|-----------|-----------|
| Whatman Uniflo 25 mm 0.45 µm PES | 9912-2504 | 500       |
| Puradisc AQUA 30 mm 0.45 µm CA   | 10462655  | 100       |
| Whatman GD/X 25 0.45 µm RC       | 6882-2504 | 150       |

## Analysis

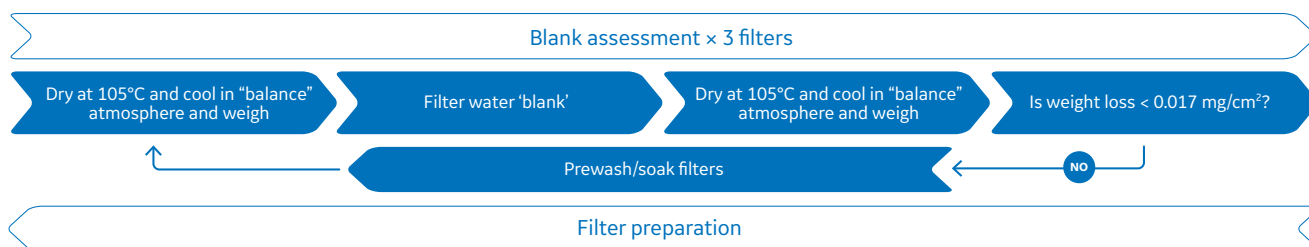
| Description                        | Item     | Pack size |
|------------------------------------|----------|-----------|
| GF/C pre-rinsed and dried 47 mm    | 2822-047 | 100       |
| GF/C RTU pre-weighed 47 mm         | 3822-047 | 100       |
| GF/C RTU pre-weighed 70 mm         | 3822-070 | 100       |
| GF/C RTU, pre-weighed 90 mm        | 3822-090 | 100       |
| GF/C glass microfibre filter 47 mm | 1822-047 | 100       |
| GF/C glass microfibre filter 90 mm | 1822-090 | 100       |
| QMC pre-fired 47 mm <b>NEW</b>     | 1855-047 | 100       |

For a complete list of products for this market application, see the Product Index pages: 4-7



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## Glass fibre RTU line of products for wastewater suspended solids testing



|  | GF/C RTU | 934-AH™ RTU for Suspended and Dissolved Solids | 934-AH RTU for Volatiles | 934-AH RTU Double Weigh |
|--|----------|--|--------------------------|-------------------------|
| Pre-washed, dried, cooled, and weighed   | •        | •  | •                        | •                       |
| Barcoded aluminium pans to download filter weight  | •        | •  | •                        | •                       |
| Box barcoded to download weights of all filters contained  | •        | •  | •                        | •                       |
| Pre-fired at 550°C   |          |  | •                        |                         |
| Drying and weighing steps repeated and documented twice to conform to process in US EPA Lab Standard Method 2540 parts C and D |          |  |                          | •                       |
| Certified filter mass loss the lesser of 0.5 mg or 4% after Standard Method 2540 parts C and D preparatory workflow            |          | •  | •                        | •                       |
| Certified mass loss of less than 0.017 mg/cm² after EN 872 preparatory workflow  | •        |  |                          |                         |
| Economy option available (washed and dried without weighing or barcoding)  | •        | •  | •                        |                         |



## Applications

- Fat and protein analysis
- Moisture testing
- Gravimetric analysis
- Trace elements analysis
- Microbiology testing
- Beer brewing
- Sugar and honey sample preparation
- Raw milk analysis

## Whatman Kjeldahl analysis weighing boat

Whatman parchment weigh boats are designed so users can collect, transfer, and drop both the sample and weighing boat into the acid solution during a Kjeldahl analysis without influencing analytical results.

## Whatman GD/X 25 mm sterile syringe filter

Whatman GD/X sterile syringe filter is designed to support filtration of viscous, hard-to-filter samples with high solids content.

## Grade 2V and Grade 597 ½ folded filter paper

Used to clarify and degassing wort, beer and other samples for analysis.

Whatman Grade 2V pre-folded fluted papers have excellent particle retention and provide a high rate of particulate removal.

Whatman Grade 597½ provides a slightly lower rate of removal, but with a faster filter time. Papers are available in a variety of diameters and folded options.

## Microbiology membranes

We provide a broad range of high-quality products for microbiological quality control in food and beverage testing. Our products help you ensure that every person who eats or drinks your products is getting the highest quality and safest ingredients.

Click [here](#) for further details on our range of microbiology membranes.



Discover Whatman filtration solutions for **dairy workflows**, for use in **honey processing** and the **beer Industry**.

Resources for quality control testing in food and beverage manufacturing industry.

## Collection

| Description   | Item     | Pack size |
|---|----------|-----------|
| Grade 609 Kjeldahl analysis weighing boat 55 × 10 × 10 mm | 10313032 | 100       |
| Benchkote sheets 46 × 57 cm                               | 2300-916 | 50        |

## Sample prep

| Description                      | Item      | Pack size |
|----------------------------------|-----------|-----------|
| GD/X 25 mm 0.2 µm PES            | 6876-2502 | 150       |
| GD/X 25 mm 0.45 µm PES           | 6876-2504 | 150       |
| SPARTAN 30 mm 0.45 µm RC         | 10463052  | 500       |
| Grade 2V folded filter 240 mm    | 1202-240  | 100       |
| Grade 597 ½ folded filter 320 mm | 10311853  | 100       |

## Analysis

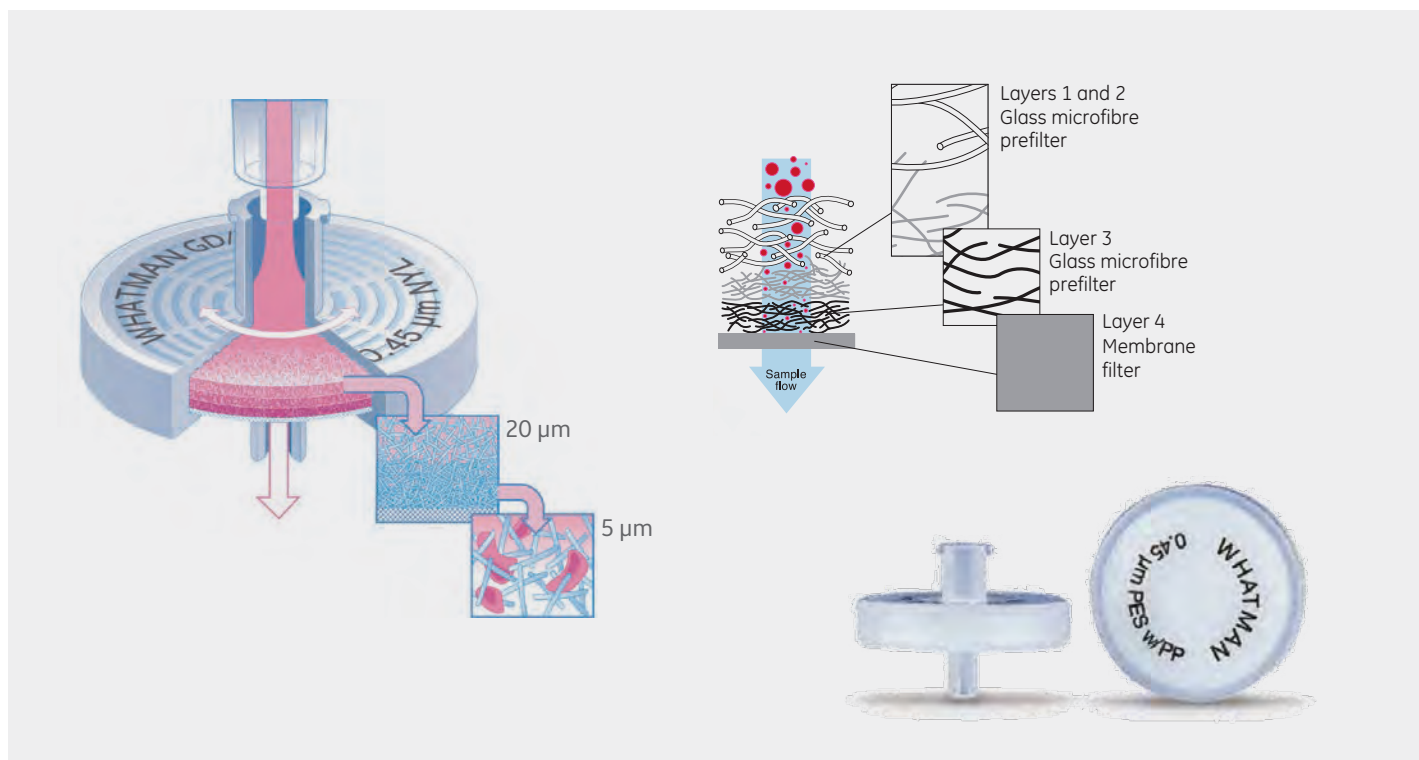
| Description   | Item      | Pack size |
|---|-----------|-----------|
| Litmus paper blue 7 mm × 5 m                              | 2600-201A | 1/roll    |
| Grade 609 Kjeldahl analysis weighing boat 55 × 10 × 10 mm | 10313032  | 100       |
| ME25 membrane, White/black grid 3.1 mm 47 mm              | 10406812  | 100       |

For a complete list of products for this market application, see the Product Index pages: 4-7



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## Whatman GD/X syringe filter for difficult-to-filter samples



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## Applications

- Soil testing
- Germination analysis
- Seed testing
- Pesticide testing

## Grade 5 qualitative filter paper

A standard grade clarifying filter excellent for cloudy suspensions and for water and soil analysis.

These cellulose filters are used in qualitative analytical techniques to determine and identify materials. Pleated qualitative filters are also available, which give improved flow rate and increased loading capacity compared to equivalent flat filters.



## Whatman Mini-UniPrep syringeless filter

Whatman Mini-UniPrep syringeless filters integrate an autosampler vial, filtration membrane, plunger, and cap/septa into one consumable product. They are built for fast and easy HPLC/UHPLC sample preparation.

- All-in-one filtration device for quick and cost-effective sample processing.
- Eliminates the need for separate syringes, syringe membrane filters, vials, and septa.



## Whatman folded filter paper range **NEW**

Whatman qualitative and quantitative cellulose filter paper grades are now available in NEW convenient formats.

The pre-folded filter paper is offered in the choice of format (pleated, pyramid or square shaped, flat quadrant and cone folded formats), diameter and grade to support customer application needs.

These ready to use formats save valuable time and provide ease of use when undertaking repetitive or multiple analysis.





Resources for quality control testing or the agricultural industry.

| Collection                             |          |           |
|--|----------|-----------|
| Description                            | Item     | Pack size |
| Grade 5 qualitative filter 47 mm       | 1005-047 | 100       |
| Seed testing paper yellow 110 x 170 mm | 10342583 | 100       |
| Grade 1 FF quadrant 125 mm <b>NEW</b>  | 10380405 | 500       |

| Sample prep                   |             |           |
|-------------------------------|-------------|-----------|
| Description                   | Item        | Pack size |
| Mini-UniPrep Amber 0.2 µm PES | UN203APEPES | 100       |
| Mini-UniPrep 0.2 µm RC        | UN203NPERC  | 100       |

| Analysis                    |          |           |
|-----------------------------|----------|-----------|
| Description                 | Item     | Pack size |
| GF/C RTU pre-weighed, 47 mm | 3822-047 | 100       |

For a complete list of products for this market application, see the Product Index pages: 4-7

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## Mini-UniPrep syringeless filter



Mini-UniPrep filter vial replaces syringe filter, syringe, autosampler vial, cap, and septum.



**Watch our video:** HPLC sample prep (conventional) vs Mini-UniPrep  
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# Guide to laboratory filtration

## Filtration devices for small volume sample preparation

Select the optimal Whatman filter for your application

**Step 1:** Choose application

**Step 2:** Choose appropriate filter

Puradisc Aqua 30

12 13



Puradisc FP

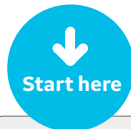
3\* 4 9\*  
11 14

\*Notes:  
3 and 9: CA



ReZist™

1 4 7 14



### Applications

1. Air venting
2. Automated filtration of samples/  
Tablet dissolution testing
3. Biological sample preparation
4. Capillary electrophoresis
5. Difficult to filter samples  
(high solid content samples)
6. Filtration of colloidal material
7. HPLC/UHPLC sample preparation
8. Ion-chromatography
9. Filtration of protein containing samples
10. Filtration of nano particles
11. Sterile filtration (use sterile filter  
and membrane with pore size 0.2 µm)
12. COD/TOC/DOC
13. Trace metal analysis (ICP/AAS/ICP-MS)
14. UV/VIS analysis

COD = Chemical oxygen demand;  
TOC = Total organic carbon;  
DOC = Dissolved organic carbon  
Note: For guidance. Only a selection  
of applications shown above

Protein Prep  
for ÄKTA™

9



Anotop™

3 4 6 7 8  
9 10\* 11 14

\*Notes: 0.02 µm



Anotop Plus

4 5 7 10\*

\*Notes: 0.02 µm



Roby

2



Uniflo

3 4 7 11  
12 13 14



SPARTAN

4 7 9 14



Whatman  
GD/X

4 5  
7 11 14



Puradisc

3\* 4 7 9\*  
11 12\* 13\* 14

\*Notes:  
3 & 9: CA, PES, PVDF  
12 & 13: PES



Mini-UniPrep G2

2 7



Mini-UniPrep

2 7



GD/XP

4 5 7 8  
12 13 14



### New filter media available soon for Puradisc and Whatman Uniflo: hydrophilic-PTFE (H-PTFE)

H-PTFE membrane can be used for both aqueous and aggressive organic solvents. This membrane is suitable for HPLC/UHPLC sample preparation as well as many other applications in a busy, high volume lab as its dual capability handles most solvents.

For more information please visit [eu.fishersci.com](http://eu.fishersci.com)

# The testament to quality

There are few companies in the world which can lay claim to such a distinguished list of clients as Whatman over the past 250 years.

In November, 1767, the artistic Thomas Gainsborough wrote; "I beg you to accept my sincerest thanks for the favour you have done me concerning the paper for drawings. I had set my heart upon getting some of it, as it is so completely what I have long been in search of... Upon my honor I would give a guinea a quire for a dozen quires of it."

Whatman paper became enormously popular with leading artists such as J M W Turner, and the quality and durability of English papers including those made by Whatman gave the English watercolour school a 50 year advantage over European artists. At the end of the 18th century, the erratic genius William Blake used Whatman papers for four of his illuminated books, the public being informed that these were printed on "the most beautiful wove paper that could be procured."

Throughout history, heads of state and world leaders have shown a particular penchant for Whatman paper. Napoleon sat for five hours on the bleak island of St. Helena writing his long and detailed will on Whatman paper only three weeks before his death in 1821. George Washington signed many state documents on Whatman paper. Queen Victoria chose Whatman paper for her personal correspondence.

In the 1930's Soviet leaders used Whatman paper to published the five year plan for the future of the USSR, while the peace treaty with Japan was signed on Whatman paper at the close of World War Two.

Today, Whatman filters have gained universal acceptance among the major scientific and industrial concerns of the developed world, from Japan to the United States, the UK to southeast Asia.

A remarkable testimony to Whatman quality—achieved through the pursuit of excellence.

## How we give back



### Supporting the Breast Cancer Research Foundation with Think Pink

We did it... Together, with our valued customers, we raised **\$121 653** for the Breast Cancer Research Foundation (BCRF) in 2019. This funds over **2500** hours of revolutionary research into the most common cancer in women worldwide, moving all of us that much closer to a cure.

For more details click [here](#).



### People-Planet-Purpose

We help therapy innovators, researchers, and healthcare providers accelerate how precision diagnostics and therapies are invented, made, and used. Our products enable biological analysis, research, development, and the manufacture of advanced therapies and vaccines. We work with the highest integrity, a compliance culture, and respect for human rights while also reducing the impact of our technology and environmental footprint.

# Chemical compatibility of membranes and housings

Selecting the right filter depends on the solvent that you are using for your application. This table will help you get it right the first time.

| Solvent               | ANP | CA | CN | PC | PE | GMF | NYL | PP | DpPP | PES | PTFE** | PVDF | RC |
|-----------------------|-----|----|----|----|----|-----|-----|----|------|-----|--------|------|----|
| Acetic acid, 5%       | R   | LR | R  | R  |    | R   | R   | R  | R    | R   | R      | R    | R  |
| Acetic acid, glacial  | R   | NR | NR |    |    | R   | LR  | R  | R    | R   | R      | R    | NR |
| Acetone               | R   | NR | NR | NR | R  | R   | R   | R  | R    | NR  | R      | NR   | R  |
| Acetonitrile          | R   | NR | NR |    |    | R   | R   | R  | R    | NR  | R      | R    | R  |
| Ammonia, 6N           | NR  |    | NR | NR | LR | LR  | R   | R  | R    | R   | R      | LR   | LR |
| Amyl acetate          | LR  | NR | NR | NR | R  | R   | R   | R  | R    | LR  | R      | LR   | R  |
| Amyl alcohol          | R   | LR | LR |    |    | R   | R   | R  | R    | NR  | R      | R    | R  |
| Benzene*              | R   | R  | R  | NR | R  | R   | LR  | NR | NR   | R   | R      | R    | R  |
| Benzyl alcohol*       | R   | LR | LR | LR | R  | R   | LR  | R  | R    | NR  | R      | R    | R  |
| Boric acid            | R   | R  | R  | R  | R  | R   | LR  | R  | R    |     | R      | R    | R  |
| Butyl alcohol         | R   | R  | R  | R  | R  | R   | R   | R  | R    | R   | R      | R    | R  |
| Butyl chloride*       |     |    |    |    |    | R   | NR  | NR | NR   |     | R      | R    |    |
| Carbon tetrachloride* | R   | NR | R  | LR | R  | R   | LR  | NR | NR   | NR  | R      | R    | R  |
| Chloroform*           | R   | NR | R  | NR | R  | R   | NR  | LR | LR   | NR  | R      | R    | R  |
| Chlorobenzene*        | R   |    | LR | NR |    | R   | NR  | LR |      | NR  | R      | R    | R  |
| Citric acid           |     |    |    |    |    | R   | LR  | R  |      | R   | R      | R    | R  |
| Cresol*               |     | NR | R  |    |    | R   | NR  | NR | NR   | NR  | R      | NR   | R  |
| Cyclohexanone         | R   | NR | NR |    |    | R   | NR  | R  | R    | NR  | R      | R    | R  |
| Cyclohexane*          | R   | NR | NR | R  | R  | R   | NR  | NR | NR   | NR  | R      | R    | R  |
| Diethyl acetamide     |     | NR | NR |    |    | R   | R   | R  | R    |     | R      | NR   | R  |
| Dimethyl formamide    | LR  | NR | NR |    |    | R   | R   | R  | R    | NR  | R      | NR   | LR |
| Dioxane               | R   | NR | NR | NR | R  | R   | R   | R  | R    | LR  | R      | LR   | R  |
| DMSO                  | LR  | NR | NR | NR | R  | R   | R   | R  | R    | NR  | R      | LR   | LR |
| Ethanol               | R   | R  | NR | R  | R  | R   | R   | R  | R    | R   | R      | R    | R  |
| Ethers*               | R   | LR | LR | R  | R  | R   | R   | NR | NR   | R   | R      | LR   | R  |
| Ethyl acetate         | R   | NR | NR | NR | R  | R   | R   | R  | R    | NR  | R      | NR   | R  |
| Ethylene glycol       | R   | LR | LR | R  | R  | R   | R   | R  | R    | R   | R      | R    | R  |
| Formaldehyde          | LR  | LR | R  | R  | R  | R   | R   | LR | LR   | R   | R      | R    | LR |
| Freon TF*             | R   | R  | R  | R  | R  | R   | NR  | NR | NR   | R   | R      | R    |    |

For more information please visit [eu.fishersci.com](http://eu.fishersci.com)

| Solvent                  | ANP | CA | CN | PC | PE | GMF | NYL | PP | DpPP | PES | PTFE** | PVDF | RC |
|--------------------------|-----|----|----|----|----|-----|-----|----|------|-----|--------|------|----|
| Formic acid              |     | LR | LR |    |    | R   | NR  | R  | R    | R   | R      | R    | LR |
| Hexane                   | R   | R  | R  | R  | R  | R   | R   | R  | R    | R   | R      | R    | R  |
| Hydrochloric acid, conc* | NR  | NR | NR | NR | NR | R   | NR  | LR | LR   | R   | R      | R    | NR |
| Hydrofluoric acid*       |     | NR | NR |    |    | NR  | NR  | LR | LR   |     | R      | R    | NR |
| Isobutyl alcohol         | R   | LR | LR | R  | R  | R   | R   | R  | R    |     | R      | R    | R  |
| Isopropyl alcohol        | R   | R  | LR |    |    | R   | R   | R  | R    |     | R      | R    | R  |
| Methanol                 | R   | R  | NR | R  | R  | R   | R   | R  | R    | R   | R      | R    | R  |
| Methyl ethyl ketone      | R   | LR | NR | NR | R  | R   | R   | R  | R    | NR  | R      | NR   | R  |
| Methylene chloride*      | R   | NR | LR |    |    | R   | NR  | LR | LR   | NR  | R      | R    | R  |
| Nitric acid, conc*       |     | NR | NR | LR | NR | R   | NR  | NR | NR   | NR  | R      | R    | NR |
| Nitric acid, 6N*         |     | LR | LR |    |    | R   | NR  | LR | LR   | LR  | R      | R    | LR |
| Nitrobenzene*            | LR  | NR | NR | NR | R  | R   | LR  | R  | R    | NR  | R      | R    | R  |
| Pentane*                 | R   | R  | R  | R  | R  | R   | R   | NR | NR   | R   | R      | R    | R  |
| Perchloro ethylene*      | R   | R  | R  |    |    | R   | LR  | NR | NR   | NR  | R      | R    | R  |
| Phenol 0.5%              | LR  | LR | R  |    |    | R   | NR  | R  | R    | NR  | R      | R    | R  |
| Pyridine                 | R   | NR | NR | NR | R  | R   | LR  | R  | R    | NR  | R      | NR   | R  |
| Sodium hydroxide, 6N     | NR  | NR | NR | NR | NR | NR  | LR  | R  | R    | R   | R      | NR   | NR |
| Sulfuric acid, conc*     | NR  | NR | NR | NR | NR | R   | NR  | NR | NR   | NR  | R      | NR   | NR |
| Tetrahydrofuran*         | R   | NR | NR |    |    | R   | R   | LR | LR   | NR  | R      | R    | R  |
| Toluene*                 | R   | LR | R  | NR | R  | R   | LR  | LR | LR   | NR  | R      | R    | R  |
| Trichloroethane*         | R   | NR | LR | NR | R  | R   | LR  | LR | LR   | NR  | R      | R    | R  |
| Trichloroethylene*       | R   |    | R  |    |    | R   | NR  | LR | LR   | NR  | R      | R    | R  |
| Water                    | R   | R  | R  | R  | R  | R   | R   | R  | R    | R   | R      | R    | R  |
| Xylene*                  | R   | R  | R  |    |    | R   | LR  | LR | LR   | LR  | R      | R    | R  |

R = Resistant; LR = Limited Resistance;  
NR = Not Recommended

\* Short-term resistance of housing

The above data is to be used as a guide only.

Testing prior to application is recommended.

\*\* Membrane may need pre-wetting with  
isopropanol/methanol if filtering a polar liquid

Empty field = Not Tested

**Material abbreviations:**

ANP – Anopore™

CA – Cellulose Acetate

CN – Cellulose Nitrate

DpPP – Polypropylene Depth Filter

GMF – Glass Microfiber

NYL – Nylon

PC – Polycarbonate

PE – Polyester

PES – Polyethersulfone

PP – Polypropylene

PTFE – Polytetrafluoroethylene

PVDF – Polyvinylidene Difluoride

RC – Regenerated Cellulose



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