The contamination by microplastics particles (MPs, 0.2–5 mm) in bottom sediments of the Baltic Sea is quantified. In total, 53 sediment samples were obtained in 8 cruises of research vessels in July–October 2015 and March–December 2016. The depths from 3 to 215 m in the Gotland, Gdansk, and Bornholm Basins are covered. Primary data is provided, along with exhaustive information on sampling dates and coordinates, depths, sampling methods, extracting procedures, control measures, detection techniques, and verification by μ-Raman spectroscopy. Number of pieces per kg dry weight is determined separately for fibres, films, and fragments. Distributions by size, plastic colour, and plastic type are presented. Modified NOAA method and μ-Raman spectroscopy were applied to obtain the data, thus they can be used for comparative analyses.

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1. Data

The dataset contains information on microplastics (MPs, 0.2–5 mm) content in 53 bottom sediment samples collected in 8 cruises of research vessels in the Gotland, Gdansk and Bornholm basins of the Baltic Sea in July–October 2015 and March–December 2016. Sampling sites (Fig. 1), their geographic coordinates, sample masses, and sediment types (Table 1) are presented. MPs content is provided in total number of pieces (fibres, films, and fragments) in a sample, and in pieces per kg dry weight (pcs per kg DW) (Table 2). Laboratory analysis workflow is described (Fig. 2). Photos of nine selected MPs specimens extracted from sediments are presented (Fig. 3). Polymer types were identified by the μ-Raman spectroscopy (Table 3). The Raman spectra of typical MPs are characterized by the hit ratio to a certain polymer type (Fig. 4).

Detailed information on MPs content for each station is shown in Supplementary Material (Appendix 1) in Microsoft Excel format. Particle distribution by size and colour are provided in Microsoft Excel format in Appendix 2 and Appendix 3, respectively. Detailed results of μ-Raman spectroscopy are presented in Appendix 4.

2. Experimental design, materials, and methods

2.1. Sediment sampling

Sediment samples were collected at 53 stations in the Baltic Proper (Fig. 1) during six cruises of oceanographic research vessels and two expeditions on small boats in the coastal zone. Ordered by
time, the cruises are: (1) boat (July 3, 2015); (2) boat (October 9, 2015); (3) RV NORD (cruise NORD March 30, 2016); (4) RV Professor Shtokman (cruise Sht 131: March 31 - April 5, 2016); (5) RV Professor Shtokman (cruise Sht 132: June 12-15, 2016); (6) RV Akademik Nikolay Strakhov (cruise ANS 32 August 5 - September 10, 2016); (7) RV NORD (cruise NORD October 27, 2016); (8) RV Akademik Nikolay Strakhov (cruise ANS 33 December 24, 2016) (Table 1). The sampling of the upper 5-7 cm of bottom sediments was performed at the depths from 3 m to 215 m using different sampling tools: (i) a hand-operated drag with mouth size of 200 × 100 mm (8 samples), (ii) a Van Veen grab (0.1 m²) (24 samples), and (iii) an “Ocean-50” grab (0.25 m²) (21 samples). The sampled bottom deposits had different grain sizes ranging from clayey mud to mixed medium or coarse sand and gravel with stones [5]. The mass of an individual sample varied from 0.4 kg to 70 kg. All the samples were stored and transported...
| № sampling stations | Vessel-station | Date             | Latitude   | Longitude   | Depth, m | Sampler              | Sampling square, m² | Mass of sample WW, kg | Sediment type                      |
|---------------------|----------------|------------------|------------|------------|----------|----------------------|---------------------|----------------------|-----------------------------------|
| 1                   | boat-9         | July 3, 2015     | 54.50019   | 19.68639   | 9        | hand-operated drag   |                     | 6.7                  | Mixed medium to coarse sand       |
| 2                   | boat-3         | October 9, 2015  | 54.62983   | 19.86867   | 3        | hand-operated drag   |                     | 14.5                 | Mixed medium or coarse sand       |
| 3                   | boat-5         | October 9, 2015  | 54.63017   | 19.86653   | 5        | hand-operated drag   |                     | 11.8                 | Fine sand                        |
| 4                   | boat-10        | October 9, 2015  | 54.63905   | 19.841     | 10       | hand-operated drag   |                     | 12.5                 | Mixed medium or coarse sand       |
| 5                   | boat-15        | October 9, 2015  | 54.63557   | 19.832     | 15       | hand-operated drag   |                     | 8.1                  | Fine sand                        |
| 6                   | boat-20        | October 9, 2015  | 54.64275   | 19.78637   | 20       | hand-operated drag   |                     | 10.1                 | Sand, gravel, stones              |
| 7                   | boat-25        | October 9, 2015  | 54.65007   | 19.7572    | 25       | hand-operated drag   |                     | 6.5                  | Fine sand                        |
| 8                   | boat-30        | October 9, 2015  | 54.67225   | 19.6877    | 30       | hand-operated drag   |                     | 10.4                 | Mixed medium or coarse sand       |
| 9                   | NORD-1         | March 30, 2016   | 55.04077   | 20.4379    | 32.6     | Van Veen Grab        | 0.4                  | 14.4                 | Fine sand                        |
| 10                  | NORD-2         | March 30, 2016   | 54.98825   | 20.33235   | 25       | Van Veen Grab        | 0.4                  | 11.3                 | Fine sand                        |
| 11                  | NORD-3         | March 30, 2016   | 54.97098   | 20.31907   | 18       | Van Veen Grab        | 0.2                  | 19.3                 | Mixed medium or coarse sand       |
| 12                  | NORD-4         | March 30, 2016   | 54.95788   | 20.30043   | 11.5     | Van Veen Grab        | 0.7                  | 18.3                 | Fine sand                        |
| 13                  | Sht 131-001    | March 31, 2016   | 54.86476   | 19.34937   | 109      | “Ocean-50” Grab      | 0.375                | 8.4                  | Mud                              |
| 14                  | Sht 131-002    | March 31, 2016   | 55.10067   | 19.22613   | 101      | “Ocean-50” Grab      | 0.1875               | 6.7                  | Clayey mud                       |
| 15                  | Sht 131-003    | March 31, 2016   | 55.33858   | 19.09974   | 81       | “Ocean-50” Grab      | 0.2                  | 11.5                 | Clayey mud                       |
| 16                  | Sht 131-004    | March 31, 2016   | 55.59533   | 19.02877   | 87.5     | “Ocean-50” Grab      | 0.125                | 3.5                  | Mud                              |
| 17                  | Sht 131-006    | April 1, 2016    | 55.33148   | 20.56187   | 31       | “Ocean-50” Grab      | 0.25                 | 16.9                 | Fine sand                        |
| 18                  | Sht 131-007    | April 1, 2016    | 55.30043   | 20.17428   | 47       | “Ocean-50” Grab      | 0.25                 | 1.6                  | Sand, gravel, stones              |
| 19                  | Sht 131-008    | April 1, 2016    | 55.16738   | 19.83263   | 68       | “Ocean-50” Grab      | 0.1                  | 2.2                  | Mud                              |
| 20                  | Sht 131-010    | April 2, 2016    | 55.5834    | 19.0338    | 81       | Van Veen Grab        | 0.1                  | 10.5                 | Fine silty mud                   |
| 21                  | Sht 131-011    | April 2, 2016    | 55.87302   | 18.93692   | 106      | “Ocean-50” Grab      | 0.25                 | 11.1                 | Mud                              |
| 22                  | Sht 131-013    | April 5, 2016    | 55.91075   | 19.05808   | 109      | “Ocean-50” Grab      | 0.125                | 2.2                  | Mud                              |
| 23                  | Sht 131-014    | April 5, 2016    | 55.89347   | 19.06263   | 109      | “Ocean-50” Grab      | 0.125                | 1.3                  | Mud                              |
| 24                  | Sht 131-015    | April 5, 2016    | 55.88102   | 19.0135    | 102      | “Ocean-50” Grab      | 0.125                | 3.4                  | Mud                              |
| 25                  | Sht 131-016    | April 5, 2016    | 55.85885   | 18.95523   | 104      | “Ocean-50” Grab      | 0.2                  | 4.0                  | Fine sand                        |
| 26                  | Sht 131-020    | April 5, 2016    | 55.81765   | 19.0521    | 95       | “Ocean-50” Grab      | 0.125                | 1.8                  | Fine sand                        |
| 27                  | Sht 131-021    | April 5, 2016    | 55.83003   | 19.16835   | 75.7     | “Ocean-50” Grab      | 0.25                 | 3.9                  | Fine sand                        |
| 28                  | Sht 132-002    | June 12, 2016    | 55.1665    | 19.833     | 67       | Van Veen Grab        | 0.05                 | 6.9                  | Fine silty mud                   |
| 29                  | Sht 132-003    | June 12, 2016    | 55.37683   | 19.867     | 91       | Van Veen Grab        | 0.05                 | 7.2                  | Mud                              |
| 30                  | Sht 132-005    | June 13, 2016    | 55.33017   | 20.55817   | 29       | Van Veen Grab        | 0.04                 | 2.3                  | Fine sand                        |
| 31                  | Sht 132-005    | June 13, 2016    | 55.32983   | 20.557     | 29       | Van Veen Grab        | 0.04                 | 2.2                  | Fine sand                        |
| 32                  | Sht 132-008    | June 13, 2016    | 55.5835    | 20.03383   | 75       | Van Veen Grab        | 0.04                 | 3.8                  | Fine silty mud                   |
| 33                  | Sht 132-014    | June 15, 2016    | 55.71117   | 19.37483   | 72.5     | “Ocean-50” Grab      | 0.125                | 11.1                 | Fine sand                        |
| No. | Site         | Date          | Coordinates     | Sample Type  | Code    | Category          |
|-----|--------------|---------------|-----------------|--------------|---------|-------------------|
| 34  | Sht 132-016  | June 15, 2016 | 55.74633, 19.46883 | “Ocean-50” Grab | 0.4     | Sand, gravel, stones |
| 35  | Sht 132-017  | June 15, 2016 | 55.7915, 19.43067 | “Ocean-50” Grab | 0.1     | Fine sand          |
| 36  | ANS 32-061   | August 5, 2016| 55.30675, 17.78327 | Van Veen Grab | 0.05    | Fine sand          |
| 37  | ANS 32-107   | August 7, 2016| 55.53618, 15.3192  | Van Veen Grab | 0.1     | Mud               |
| 38  | ANS 32-108   | August 7, 2016| 55.33367, 15.57745 | Van Veen Grab | 0.1     | Mud               |
| 39  | ANS 32-203   | August 14, 2016| 55.60955, 18.0173  | Van Veen Grab | 0.1     | Fine silty mud     |
| 40  | ANS 32-208   | August 26, 2016| 55.43155, 20.30083 | Van Veen Grab | 0.1     | Fine sand          |
| 41  | ANS 32-211   | August 29, 2016| 55.50555, 20.27662 | Van Veen Grab | 0.1     | Mixed medium or coarse sand |
| 42  | ANS 32-227   | September 7, 2016| 56.70733, 19.38575 | “Ocean-50” Grab | 0.125   | Mixed medium or coarse sand |
| 43  | ANS 32-242   | September 8, 2016| 57.32478, 19.86292 | “Ocean-50” Grab | 0.125   | Clayey mud         |
| 44  | ANS 32-284   | September 10, 2016| 58.4011, 20.38942 | “Ocean-50” Grab | 0.125   | Mud               |
| 45  | NORD-5       | October 27, 2016| 54.97673, 20.24697 | Van Veen Grab | 0.1     | Mixed medium or coarse sand |
| 46  | NORD-6       | October 27, 2016| 54.97745, 20.25677 | Van Veen Grab | 0.2     | Mixed medium or coarse sand |
| 47  | NORD-7       | October 27, 2016| 54.97768, 20.25875 | Van Veen Grab | 0.1     | Coarse silt        |
| 48  | NORD-8       | October 27, 2016| 54.98823, 20.26327 | Van Veen Grab | 0.2     | Mixed medium or coarse sand |
| 49  | NORD-9       | October 27, 2016| 54.98827, 20.25722 | Van Veen Grab | 0.2     | Mixed medium or coarse sand |
| 50  | NORD-10      | October 27, 2016| 54.98652, 20.23522 | Van Veen Grab | 0.2     | Mixed medium or coarse sand |
| 51  | NORD-11      | October 27, 2016| 54.98363, 20.22802 | Van Veen Grab | 0.2     | Mixed medium or coarse sand |
| 52  | NORD-12      | October 27, 2016| 54.99, 20.20848   | Van Veen Grab | 0.5     | Mixed medium or coarse sand |
| 53  | ANS 33-060   | December 24, 2016| 54.99017, 15.64217 | “Ocean-50” Grab | 0.5     | Mud               |
## Table 2
Number of pieces (fibres, films, and fragments) in sample and per kg dry weight (pcs per kg DW).

| N° sampling stations | Mass of analysed sample, g | Fragments, pcs | Films, pcs | Fibres, pcs | Cfragments, pcs per kg DW | Cfilms, pcs per kg DW | CFibres, pcs per kg DW | Ctotal, pcs per kg DW |
|----------------------|-----------------------------|----------------|-----------|-------------|--------------------------|----------------------|------------------------|------------------------|
| 1                    | 300                         | 6              | 12        | 88          | 20                       | 40                   | 293                    | 354                    |
| 2                    | 400                         | 0              | 4         | 29          | 0                        | 13                   | 91                     | 103                    |
| 3                    | 400                         | 5              | 71        | 85          | 16                       | 222                  | 265                    | 503                    |
| 4                    | 400                         | 7              | 25        | 24          | 20                       | 71                   | 68                     | 158                    |
| 5                    | 400                         | 0              | 37        | 56          | 0                        | 114                  | 172                    | 286                    |
| 6                    | 300                         | 11             | 6         | 209         | 37                       | 20                   | 698                    | 754                    |
| 7                    | 300                         | 3              | 35        | 79          | 10                       | 117                  | 264                    | 390                    |
| 8                    | 400                         | 2              | 11        | 37          | 6                        | 33                   | 111                    | 150                    |
| 9                    | 400                         | 0              | 138       | 119         | 0                        | 627                  | 541                    | 1168                   |
| 10                   | 400                         | 8              | 85        | 225         | 30                       | 339                  | 897                    | 1266                   |
| 11                   | 400                         | 1              | 28        | 36          | 3                        | 88                   | 113                    | 204                    |
| 12                   | 400                         | 4              | 92        | 52          | 13                       | 339                  | 189                    | 541                    |
| 13                   | 400                         | 1              | 15        | 143         | 10                       | 146                  | 1396                   | 1553                   |
| 14                   | 400                         | 11             | 8         | 66          | 148                      | 108                  | 887                    | 1142                   |
| 15                   | 400                         | 4              | 21        | 80          | 20                       | 104                  | 395                    | 519                    |
| 16                   | 400                         | 16             | 12        | 107         | 155                      | 116                  | 1037                   | 1308                   |
| 17                   | 400                         | 30             | 10        | 33          | 115                      | 38                   | 127                    | 281                    |
| 18                   | 400                         | 58             | 28        | 53          | 192                      | 93                   | 175                    | 460                    |
| 19                   | 400                         | 18             | 10        | 253         | 88                       | 49                   | 1231                   | 1367                   |
| 20                   | 400                         | 3              | 45        | 465         | 60                       | 893                  | 9226                   | 10179                  |
| 21                   | 400                         | 1              | 100       | 97          | 8                        | 772                  | 748                    | 1528                   |
| 22                   | 400                         | 3              | 2         | 138         | 31                       | 21                   | 1426                   | 1477                   |
| 23                   | 400                         | 3              | 12        | 176         | 12                       | 48                   | 710                    | 770                    |
| 24                   | 400                         | 1              | 16        | 228         | 12                       | 147                  | 2050                   | 2209                   |
| 25                   | 400                         | 0              | 7         | 125         | 0                        | 38                   | 682                    | 721                    |
| 26                   | 400                         | 3              | 2         | 79          | 12                       | 8                    | 311                    | 331                    |
| 27                   | 400                         | 18             | 27        | 156         | 64                       | 97                   | 558                    | 719                    |
| 28                   | 400                         | 2              | 17        | 72          | 17                       | 142                  | 599                    | 758                    |
| 29                   | 400                         | 3              | 12        | 43          | 28                       | 130                  | 487                    | 646                    |
| 30                   | 400                         | 4              | 9         | 44          | 12                       | 27                   | 134                    | 173                    |
| 31                   | 400                         | 4              | 17        | 35          | 11                       | 48                   | 99                     | 158                    |
| 32                   | 400                         | 2              | 7         | 35          | 29                       | 103                  | 515                    | 647                    |
| 33                   | 400                         | 7              | 23        | 77          | 24                       | 80                   | 268                    | 373                    |
| 34                   | 185                         | 2              | 23        | 51          | 21                       | 243                  | 539                    | 804                    |
| 35                   | 400                         | 19             | 10        | 91          | 173                      | 91                   | 827                    | 1091                   |
| 36                   | 400                         | 12             | 9         | 68          | 40                       | 30                   | 228                    | 299                    |
| 37                   | 400                         | 10             | 16        | 90          | 95                       | 152                  | 857                    | 1104                   |
| 38                   | 400                         | 0              | 6         | 117         | 0                        | 69                   | 1354                   | 1424                   |
| 39                   | 400                         | 6              | 16        | 181         | 38                       | 101                  | 1143                   | 1282                   |
| 40                   | 400                         | 9              | 5         | 37          | 30                       | 17                   | 124                    | 171                    |
| 41                   | 400                         | 1              | 16        | 44          | 3                        | 49                   | 135                    | 187                    |
| 42                   | 400                         | 3              | 9         | 60          | 12                       | 35                   | 232                    | 278                    |
| 43                   | 400                         | 1              | 1         | 33          | 11                       | 11                   | 371                    | 393                    |
| 44                   | 400                         | 17             | 9         | 259         | 176                      | 93                   | 2675                   | 2943                   |
| 45                   | 400                         | 3              | 14        | 18          | 9                        | 43                   | 55                     | 107                    |
| 46                   | 400                         | 6              | 60        | 38          | 19                       | 185                  | 117                    | 321                    |
| 47                   | 400                         | 19             | 60        | 149         | 85                       | 273                  | 682                    | 1040                   |
| 48                   | 400                         | 0              | 30        | 31          | 0                        | 93                   | 96                     | 185                    |
| 49                   | 400                         | 0              | 17        | 30          | 0                        | 50                   | 88                     | 138                    |
| 50                   | 400                         | 4              | 23        | 32          | 12                       | 70                   | 97                     | 179                    |
| 51                   | 400                         | 4              | 37        | 47          | 13                       | 116                  | 147                    | 276                    |
| 52                   | 400                         | 2              | 20        | 37          | 7                        | 63                   | 116                    | 186                    |
| 53                   | 400                         | 26             | 7         | 54          | 252                      | 63                   | 522                    | 837                    |
in a closed metallic bucket or can and were homogenized prior to handling in the laboratory with a steel mixer. The buckets containing samples were stored at room temperature until analysis, and clean stainless-steel spoons were used for removing samples from the bucket.

2.2. Methods

2.2.1. Sample preparation

Microplastics were extracted from the sediment samples using the method employed by Ref. [1] with modifications [2,3]. To maximize extraction rates, sediments with high clay content were washed through a sieve cascade (0.333 mm, 174 mm, 174 mm) before the extraction to remove clayey mud fractions, which hampers the extraction process [3]. The sediment retained by the sieves was subjected to flotation (Fig. 2).

In brief, the modified NOAA method consists of the following main steps [2,3]: (1) Multiple MPs extraction from a sediment sample by means of density separation with the ZnCl₂ solution (specific density 1.6 g mL⁻¹), (2) Filtering of supernatant solution above the sediment with the filter funnel, (3) Wet peroxide oxidation on the water bath, (4) Calcite fraction digestion with HCl solution, (5) Filtering with filter funnel, (6) Density separation to detach oxidized organic matter, (7) Filtering with filter funnel, (8) MPs detection with a stereomicroscope, and additionally (9) MPs identification with a Raman spectrometer (Fig. 2).

2.2.2. Analytical techniques

The MP particles were optically analysed and photographed using a stereomicroscope (Micromed MC2 Zoom Digital) with magnification from ×10 to ×40 directly on the filter surface according to recommendations for microscopic determination [6].
Table 3
Polymer type and types of synthetic dyes identified using μ-Raman spectroscopy.

| Polymer type                  | Acronym   | %    | Types of Synthetic Dyes (SD):                     |
|-------------------------------|-----------|------|--------------------------------------------------|
| 1 Synthetic dyes              | SD        | 47.2 | Hostasol-Green G-K                               |
| 2 Polyethylene                | PE/HDPE/LDPE | 11.1 | Irgazin Blue                                     |
| 3 Polypropylene               | PP        | 8.3  | Cobalt phthocyanine                              |
| 4 Polymer blend               | Polymer blend | 5.6  | Terra-Verte                                      |
| 5 Polyethylene terephthalate/Polyester | PET/PES | 4.6  | Toluidine red                                    |
| 6 Polydimethylsiloxane        | PDMS      | 3.7  | Molybdenum oxide                                 |
| 7 Cellulose/Cellulose acetate | CE/CA     | 3.7  | Titanium dioxide                                 |
| 8 Polyvinyl chloride          | PVC       | 2.8  | Cobalt sulphate                                  |
| 9 Synthetic rubber            | Synthetic rubber | 1.9  | Motoperm Blue                                    |
| 10 Polystyrene                | PS        | 0.9  | Napels Yellow                                    |
| 11 Methyl vinyl ether         | PVME      | 0.9  |                                                  |
| 12 Carbon                     | Carbon    | 0.9  |                                                  |
| 13 Polymer methylpentene      | PMP       | 0.9  |                                                  |
| 14 Plasticine                 | Plasticine| 0.9  |                                                  |
| 15 Nylon                      | Nylon     | 0.9  |                                                  |
| 16 Polytetrafluioethylene     | PTFE      | 0.9  |                                                  |
| 17 Polyvinilidene             | PVDF      | 0.9  |                                                  |
| 18 Poly (methyl 2-methylpropenoate) | PMMA | 0.9  |                                                  |
| 19 Polymethacrylamide         | PMAM      | 0.9  |                                                  |
| 20 VICRYL (polyglactin)       | VICRYL    | 0.9  |                                                  |
| 21 Polyolefin elastomers      | POE       | 0.9  |                                                  |

Fig. 3. Polymer samples.
Fig. 4. Spectra of typical MPs identified by μ-Raman spectroscopy, the hit ratio between the specimen spectra and reference spectra (in percentages).
All the analysis and detection procedures were performed by the single operator to exclude inter-operator variability. Since plastics particles cannot be fully exactly identified only by visual observation [7–11], µ-Raman spectroscopy was used to verify the result and attain the composition of plastic-like particles [12]. Raman Centaur U (LTD «NanoScanTechnology», Russia) spectrometer was used to obtain plastic spectra [13].

2.2.3. Contamination control and quality analysis

Metal laboratory equipment and glass tableware were used where possible to minimize external contamination. All instruments used during the extraction process were washed with distilled water and dried before the analysis. Cotton lab coats and clothing from non-synthetic materials were used to minimize airborne contamination during samples handling and extraction.

Twelve blank samples were run to assess the level of background contamination according to Ref. [3].

As an additional measure to control the extraction efficiency, artificial reference particles (ARPs) were added to each sample prior to the extraction procedure. Rectangular ARPs with the side dimension of 0.88 ± 0.41 mm (p = 0.05; n = 40) were prepared from a sheet of fluorescent PET 0.46 mm ± 0.02 mm thick (p = 0.05; n = 40). These ARPs, with their artificial shape and characteristic fluorescence, are easily distinguishable from MPs of natural sediments, and provide a clear indication of the quality of the extraction procedure [3].

2.2.4. Classification methods

A visual assessment was performed to identify the shape, size, and colour of MPs according to the physical characteristics of the particles. The extracted MPs were classified into three groups: fragments, films, and fibres according to Ref. [14].

Particle colour was divided into the following categories: transparent, white, green, blue, yellow, red, brown, and black, which is close to categories according to Refs. [8,15]. The blue category included deep blue, light blue, and violet particles. The yellow category also included orange particles. The transparent category included colourless and muddy particles. The red category also included pink and purple particles. The black category included transparent black and grey particles.

The extracted particles were divided into 24 categories using similarity of their visual appearance (shapes, colours), mechanical quality (rigid, soft, elastic, foamed, etc.), and behaviour during a hot-needle test.

2.2.5. µ-Raman spectroscopy verification

The analysis procedure followed [13]. Out of the identified MPs, the core polymer type of some specimens was impossible to identify because of the strong signal induced by synthetic dyes (SD) or strong background fluorescence. Still, the fact of presence of SD was considered as confirmation of synthetic origin of a particle. So, all such specimens were accounted as MPs (for example, Fig. 3). Polymer type and types of synthetic dyes identified using µ-Raman spectroscopy are presented in Table 3. In other cases, the identification by µ-Raman spectroscopy was not possible due to too small particle size or chemical compounds remaining on the surface of a particle. Raman spectra of top 8 typical MPs are presented in Fig. 4.

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Conflict of Interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

Appendix A. Supplementary data

Supplementary data to this article can be found online at https://doi.org/10.1016/j.dib.2019.104887.

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