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# THE PERIOD OF FLOWER CARPETS AND OTHER COLOURFUL GARDEN DECORATIONS, I.E. KINDS OF ORNAMENTAL SPECIES USED IN EUROPE AT THE TURN OF THE 20TH CENTURY

# CZAS KWIATOWYCH KOBIERCÓW I INNYCH BARWNYCH OZDÓB OGRODOWYCH. CZYLI JAKIE GATUNKI OZDOBNE STOSOWANO W EUROPIE NA PRZEŁOMIE XIX I XX WIEKU

#### Abstract

Since the 16th century species of flowers imported from the New World to Europe have enriched botanical gardens, and later palace or manor gardens and public gardens. In the second half of the 19th and in the 20th centuries new flower forms appeared i.e. clumps, flowerbeds and flower decorations. These plant elements were particularly appreciated taking into consideration a quickly growing range of new species and flowering plants. They were also popularized by their creators, gardeners, owners and the users of the modern shaped gardens. In the descriptions of gardens available today, in treatises or many lithographies, we can find the flower forms and species planted in those days. The aim of this thesis is to present selected flower forms in Polish parks and gardens at the turn of the 20th century and specifying species and flower plants typical of certain solutions.

Keywords: flower forms flower clumps flower baskets and carpets ornamental plant species introduction landscape gardens

#### Streszczenie

Od XVI wieku gatunki sprowadzane z Nowego Świata do Europy wzbogacają program roślinny ogrodów botanicznych, później pałacowych, dworskich, miejskich publicznych. W II połowie XIX i w wieku XX zaznacza się szczególny rozwój nowych form kwiatowych, m.in. kwietników, klombów kwiatowych, ozdób kwiatowych. Te elementy roślinne zyskują na wartości ze względu na szybko powiększającą się w tym czasie ofertę nowych gatunków i odmian roślin kwiatowych. Są również popularyzowane przez ich twórców, ogrodników, właścicieli i użytkowników budowanych/ kształtowanych w nowatorskim duchu ogrodów. W dostępnych dzisiaj opisach ogrodów, traktatach czy na wielu litografiach można odnaleźć wzory form kwiatowych oraz stosowane wówczas gatunki. Celem tej pracy przegladowej jest zaprezentowanie wybranych form kwiatowych w polskich parkach i ogrodach przełomu XIX i XX wieku i wyszczególnienie typowych dla określonych rozwiązań gatunków i odmian roślin kwiatowych.

Słowa kluczowe: formy kwiatowe klomby kwiatowe kosze i kobierce kwiatowe gatunki roślin ozdobnych introdukcja ogrody krajobrazowe

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#### 1. Introduction

Flower forms are the least permanent elements of a garden. They are only known from the literature on changing garden styles and gardening. These are compositions of ornamental plants such as flowerbeds, flower carpets, colourful flower borders, flower baskets or flower clocks. In the 19th century, the owners of gardens, gardeners and garden planners, using "novelty plants", changed the look of their gardens by introducing colourful garden decorations [25, 26].

Particularly appreciated are ornamental flowers, as "...they are beautiful and fragrant, but dumb witnesses of our domestic lives, sharing the rare periods of joy and frequent periods of sadness of our lives and making it easier" [18]. Many books appear which are available to a larger number of readers, magazines and gardening guidebooks presenting new garden techniques, methods of plant cultivation, especially for those imported from abroad, as well as newly adapted species. Archived and available texts and iconographical materials are an important source of knowledge about 19th-century garden decorations, their appearance, and the plants grown in those days.

This thesis presents selected Polish archived sources of literature in which the authors show "flower decorations" typical of landscape gardens. The study of 19th- and 20th- century writings, accompanied by numerous pictures and descriptions of these spatial elements, instructions for their planning and techniques, show the changes in garden styles at the turn of the century, focus on some characteristic species of plants, especially new ones introduced into gardens. The studies conducted enable us to depict the changes in the flower forms, the variety of ornamental plant species used at that time, and changing selections in the European gardens and parks of this period.

# 2. "Flower decorations" of the 19th and the beginning of the 20th century and their plants

In the 19th-century gardens new flower forms were introduced very slowly, both in private and in public parks such as on squares and boulevards. At the beginning they were combined with some other elements, e.g. with mixed clumps. They constituted flower borders, i.e. rows of the shortest plants surrounding higher forms placed in the middle (trees, bushes, tall perennial plants). They played the role of "the forward guard and they marked the edge of a beautiful flowerbed" [11]. They were willingly introduced to flower clumps created from elaborate perennial plants, e.g. from mallows (*Alcea*), larkspurs (*Delphinium*), mullein (*Verbascum*), cannas (*Canna*), and dahlias (*Dahlia*) which were mixed with seasonal plants, e.g. sweet pea (*Lathyrus*), snapdragon (*Antirrhinum*), bulbs such as tulips (*Tulipa*), iris (*Iris*), narcissi (*Narcisuss*) or pot plant species exposed in summer (angel's trumpets – *Datura*, different kinds of palms – *Cocos, Bismarkcia, Livistona*, dagger plant – *Yucca*, bamboo – *Bambusa*, banana – *Musa*, *Dracaena*, azalea – *Rhododendron*, giant rhubarb – *Gunnera*).

**Mixed and flower clumps** were to constitute a three-dimensional block presenting a changing system of bright colours over the whole season, in which the smallest, flowering species marked their borders. The following elements were important: stability, colour, the

period of blooming and the smell of planted ornamental plants. New species, especially those imported from abroad which appeared in the direct vicinity or nearby the house, constituted a part of it and they connected the house with the garden space [18]. They also appeared in the shape of colourful ribbons along roads and paths. If the ribbon was very long, it was suggested that it should be diversified by introducing "different" plants in certain gaps. These could be plants of flowers of different colour or height.

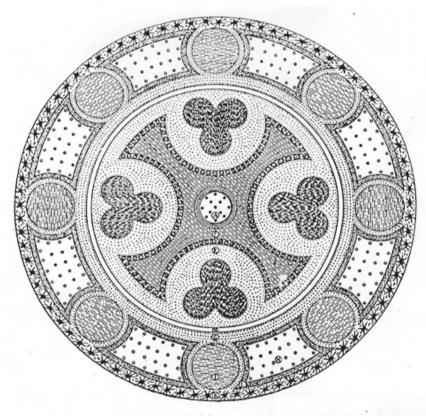
An example of double-row plantings is the following sets of plants presented by Jankowski [16], e.g. 1-line Petunia hybrida grandiflora, 2-line: Allysum benthamii or Lobelia erinus; the next: 1-line: stocks (Matthiola) in different colours and following them colourful asters (Aster) or garden balsam (Impatiens balsamina), 2-line: mignonette (Reseda) or Drummond's phlox (Phlox drummondii). The triple-row are the following: 1-line: zinnia (Zinnia elegants) or snapdragon (Antirrhinum majus), 2-line: carnation (Dianthus chinensis) different species, 3-line: candytuft (Iberis), lobelia (Lobelia erinus), heartsease (Viola tricolor) or white full daisies (Bellis perennis). According to the author making such combinations is easy, but it "requires a detailed knowledge of the plant, its height and space needed for its growth, and the colour of flowers". In these colourful forms verbenas (Verbena), begonias (Begonia), purslanes (Portulaca), lobelias (Lobelia), nasturtiums (Tropaeolum), petunias (Petunia), phloxes (Phlox), fuchsias (Fuchsia), marigolds (Tagetes), dahlias (Dahlias), and mignonettes (Reseda) dominated [17]. Native ornamental species such as cornflowers (Centaurea), poppies (Papaver), wild carnations (Dianthus) and corncockles (Agrostemma) were placed in distant parts of the garden. "Distant flowerbeds can be created from common and field flowers", advised Czartoryska [11], adding that: "they should be planted in abundance". Jankowski [16] pointed out that "the main flowerbed should be in front of the windows and some others in the garden (...). Splendid and definitely the most beautiful plants should be planted there".

Flowering species organized in new forms and presented in a larger number decorated the interiors adjoining the palace or the mansion "to be admired and enjoyed by everyone" [18]. They constituted the "formal flower garden". In these places there appeared different garden decorations – flowerbeds in the form of flower baskets, stars, geometrical colourful planes with an elaborate decoration of various blooming species. They were to be *colours shining in the sun like a rainbow* as Jankowski wrote [16].

Flower baskets – *corbeilles*, i.e. flowerbeds in the oval or the round shape placed on the lawn were bordered by low edgings – wickery, steel or metal matting, and in the later period by ceramic tiles or boxwood. "Rich people use cinder together with sea shells to surround the flowerbeds" [1]. The inside of the flowerbeds was filled with short flowers while in the middle there were placed higher plants. There were planted *the most beautiful and the rarest species* [11], i.e. narcissi (*Narcisuss*), forget-me-nots (*Myosotis*), pansies (*Viola*), love-lies-bleeding (*Amaranthus*), stocks (*Matthiola*), asters (*Aster*), zinnias (*Zinnia*), lobelias (*Lobelia*), carnations (*Dianthus*), lupines (*Lupinus*) and as a hoop stick there were used: nasturtium (*Tropaeolum majus*), morning glory (*Ipomoea purpurea*), ivy (*Hedera helix*) and clematis (*Clematis ssp.*) [15, 18, 28, 29].

Another popular form in European private and public gardens were **flower carpets** – flowerbeds of a geometrical decoration, based on a circle, oval, or quadrangle and placed on a flat area, frequently in a depression or in a characteristic elevation of the area to make the image visible (Ill. 1). "They surround palaces of aristocracy or fill up the public parks of capital cities and larger world cities and the variety of plants, the harmony of colours, the

elaboration and the creativity of the image...display the extraordinary taste and imagination of their creator" [28]. They constituted a complicated pattern by contrasting short species of flowers with decorative leaves giving a permanent colourful effect during the whole season. [Flowerbeds] "...organized with deciduous plants and some flowery, dense and short with long lasting blooming, present a colourful mosaic during the whole summer until the first frost in a permanent form. Looking at such a flowerbed, one thinks of a flowerbed made of colourful threads" [16].

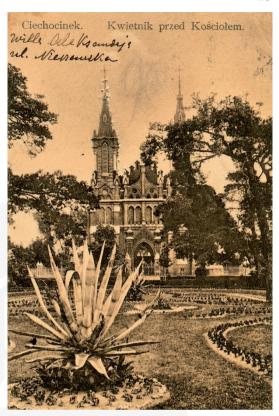


- A. Pelargonium zonale Golden Chain.
  B. Lobelia Erinus Schwabenmädchen.
- C. Alternanthera amoena.
- D. Echeveria Desmetiana.
- E. Mentha Pulegium gibraltarica. F. Pelargonium zonale Harry Hico er.
- G. Trifolium repens atropurpureum oder Alternanthera versicolor grandis. H. Alternanthera paronychioides nana
- aurea. I. Begonia semperflorens Erfordia
- K. Echeveria secunda glauca
- Lobelia Erinus Kaiser Wilhelm.
- M. Begonia Schmidtii.

Ill. 1. Picture of the flowerbed with the list of plants according to Götze 1910 (Source: K. Götze, Album für Teppichgärtnerei und Gruppenbepflanzung, 2, Aufl. Erfurt: L. Möller, 1897)

Decorative motifs were kept smooth, because the plants grown were of the same height. Sometimes higher. single plants were placed, frequently in flower pots (Ill. 2 and 3). They were placed in the middle or in the vicinity of the flowerbeds. These were exotic plants such as agava (Agava americana), dwarf palm (Dracena indivis), banana (Musa enseta), date palm (Phoenix reclinata), chinese fun palm (Livistona chinensis), or monthly rose (Rosa chinensis semperflorens) which were moved to a conservatory in winter [22].

The most important species used in the flowerbeds, also called mosaic or tapestry, included the following: parrot leaf (Alternanthera amoena), calico plants (Alternanthera versicolor), pussy-toes (Antennaria dioica), painted nettle (Coleus blumei), licorice plant (Gnaphalium lanatum), bloodleaf (Iresine herbstii), beefstake plant (Pyrethrum parthenium subsp. aureum), purple shiso (Perilla nankinensis), and cotton lavender (Santolina chamaecyparissus). Among



Ill. 2. Agaves – plants in pots on flowerbed in Ciechocinek (Poland). Postcard from 1905 (Source: author's collection)



Ill. 3. Flower clumps In Regent's Park. Postcard from 1900 (Source: http://dakotaboo-vintage-postcards. blogspot.com/2012\_06\_01\_archive.html, online: 2.02.2015)

the blooming plants the following were used: whiteweed (*Ageratum*), begonia (*Begonia*), geranium (*Pelargonium*), heliotrope (*Heliotropium*), marigolds (*Calendula*), dahlias (*Dahlia*) and a group of plants blooming in spring such as scilla (*Scilla*), primrose (*Primula*), snowdrop (*Galanthus*), forget-me-not (*Myosotis*), tulips (*Tulipa*), hyacinths (*Hyacinthus*), narcissi (*Narcisus*), pansies (*Viola*), daisies (*Bellis*) or leopard's bane (*Doronicum*) [4, 29]. The plants were grown densely and in contrasting colours to make a complicated pattern visible from a far distance. The main design rule for these flower decorations was to create clear lines and colourful spots based on a symmetrical and axial layout.

Thanks to Prince Hermann Ludwig Henrich von Pückler-Muskau and Humphry Repton, in the 19th and 20th centuries, special forms of flower carpets such as the **arabesque**, **cornucopias**, **flower clocks** or **figural ornaments** built on an iron construction, e.g. pyramids or poles, became popular [23, 27]. They constituted very attractive, but at the same time short-lasting decorations of private and public spaces. The best place for the exposure of arabesque forms and floral clocks were sloping areas such as cliffs and hillsides. Both arabesques presenting plants, animals, heraldic and flower clocks with a face of a digital floral decoration, constituted large, spatial forms which survived throughout the 20th century [22]. They became a characteristic element of urban and spa parks. Groups of ornamental plants were shaped in a similar way as flowerbeds, and their background was always a lawn or grass.

In floral clocks and figural constructions decorative species were planted with leaves from the succulent group: *Echeveria secunda, Sedum carneum, var. Sphaerincola, Mesembrianthemum cordifolium* as well as *Ageratum mexicanum, Begonia semperflorens, Lobelia erinus, Viola tricolor* subs. *maxima* and *Pelargonium zonale* [16, 20, 23] (Tab. 1).

Table 1
Selected species of ornamental plants used in gardens and parks in the past

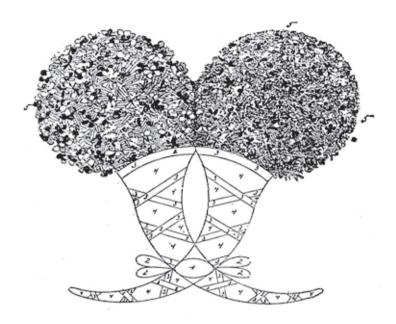
No.	Accepted names of ornamental plant species grown in the parks and gardens			
	19th – 20th centuries*	21st century**		
1	Agave americana	unchanged		
2	Ageratum mexicanum	Ageratum houstonianum		
3	Alternanthera amoena	Alternanthera bettzickiana		
4	Alternanthera versicolor	Alternanthera pulchella		
5	Antirrhinum majus	unchanged		
6	Begonia semperflorens	Begonia cucullata var. hookeri		
7	Celosia cristata	Celosia argentea var. cristata		
8	Centaurea candidissima	Centaurea cineraria		
9	Chamaerops humilis	unchanged		
10	Chrysanthemum coronarium	Glebionis coronaria var. coronaria		
11	Coleus Blumeii	Plectranthus scutellarioides		
12	Corypha Australis	Livistona australis		
13	Cuphea platycentra	Cuphea ignea		
14	Datura fastuosa	Datura metel		
15	Dracaena indivisa	Cordyline indivisa		
16	Echeveria Desmetiana	Echeveria peacockii		

No.	Accepted names of ornamental plant species grown in the parks and gardens		
	19th – 20th centuries*	21st century**	
17	Echeveria secunda	unchanged	
18	Festuca ovina glauca	unchanged	
19	Fuchsia hybrida	unchanged	
20	Gazania splendens	Gazania rigens var. rigens	
21	Gnaphalium lanatum	Euchiton involucratus	
22	Godetia Whitneyi,	Clarkia amoena subsp. whitneyi	
23	Heliotropium peruvianum	Heliotropium arborescens	
24	Iresine acuminata	Iresine diffusa	
25	Iresine Lindenii	Iresine lindenii	
26	Cotyledon glauca	Echeveria secunda	
27	Leucophyta Brownii	Leucophyta brownii	
28	Lobelia Erinus	Lobelia erinus	
29	Mentha pulegium	unchanged	
30	Mesembryanthemum cordifolium	unchanged	
31	Pelargonium peltatum	unchanged	
32	Pelargonium zonale	unchanged	
33	Pyrethrum parthenium	Tanacetum parthenium	
34	Petunia hybrida	unchanged	
35	Salvia patens	unchanged	
36	Sedum glaucum	Sedum hispanicum	
37	Senecio cineraria	unchanged	
38	Santolina chaecyparissus	unchanged	
39	Viola tricolor	unchanged	
40	Yucca filamentosa	unchanged	
41	Yucca recurva	Yucca recurvifolia	
42	Zinnia elegans	unchanged	
43	Helichrysum petiolare	unchanged	
44	Perilla frutescens	unchanged	

Naming by E. Jankowski, *Garden at the manor house*, T. 2. Edition by the author, Warszawa 1900; K. Götze, *Album für Teppichgärtnerei und Gruppenbepflanzung*, 2. Aufl. Erfurt: L. Möller, 1897.

Flower decorations used at the turn of the 20th century, with an abundance of blooming flowers and elaborate leaves, improved garden quality and made the parks more attractive. The variety of species made it possible to learn about them, their morphological and decorative features, and their practical use, e.g. the methods for quick procreation, the conditions of their growth, and the possibility of their combination with other plants. n example is the **cornucopias** created from plants that were grown directly in the ground as well as from pot plants. The species planted in the ground marked the shape of the composition (III. 4). However, the "overflowing" bouquet consisted of blooming and deciduous plants grown and exposed to a certain area in pots, creating in this way a clear bulge. These flowers were more easily changed than those planted directly in the ground.

<sup>\*\*</sup> Naming by W. Erhardt, E. Götz, N. Bödeker, S. Seybold, *Zander. Handwörterbuch der Pflanzennamen*, Ulmer, Stuttgart 2008.



- 2. Lobelia Erinus Pearl lub Nertera depressa.
- Echeveria secunda—u góry rogów mniejsze, ku nasadzie coraz większe.
- Alternanthera atropurpurea, Antennaria tomentosa lub Spergula pilifera aurea.
- 5. Bukiety złożone z roślin kwitnących, jak: Begonie, pelargonie, ułanki, figlarze, płomyki, witułki ogrodowe, Reseda odorata aurea, spiralis, Machet, Alyssum Benthami compatum; z traw: Paspalum, Lagurus, Briza maxima i minima, Agrostis nebulosa, Stipa pennata; z rośtin liściastych, jako to: Lonicera brachypoda aurea reticulata, Coleus, Achyranthes, Iresine.

Ill. 4. An example of flower decoration – a horn of plenty with the list of plants (Source: [17])

Nowadays, urban parks which were created at the turn of the 20th century constitute, as in the past, an important element of in the public space of European cities, and they influence the quality of lives of their inhabitants [2, 10, 14, 30, 31, 33, 35]. The flower carpets and plant decorations popular in the 19th and at the beginning of the 20th century are rarely used nowadays. The reason is economic, i.e. the cost of plant material or the high cost of their care [4, 13, 19, 24, 34]. In the modern design of urban greenery, designers and gardeners exchange the old forms for new and less expensive ones. These are usually different kinds of plant containers for creating plant compositions, simple flower beds, flower stone walls or roof gardens, and the construction of green walls and flower meadows [3, 5, 6, 12, 30].

However, research on the use and introduction of ornamental species in historic gardens and parks is still being conducted [14, 21, 22, 32]. Attention is paid to the compatibility of species to a specific period, flower form and the features of a historic building. In the course of time the variety of flower plants used has increased. In the garden market more and more elaborate species of old plants appear – most frequently those with bigger

flowers, inflorescence, and richer colours, marked by a longer period of flowering, and larger resistance to unfavourable growing conditions, diseases, or worms. Reproducing the 19th-century forms and garden decorations, it is possible to contemporise plant species, especially flowering plants.

#### 3. Conclusions

In the past, the creators of parks and gardens searched for new plants to enrich their garden compositions, decorate, and raise the prestige of some buildings. In those days the main rule for creating different decorations and flower forms that were introduced to the private and urban areas was to use a broad range of the decorative species available on the flower market. Numerous plants came to Europe from the new continents. These were the following: French marigold (*Tagetes patula*), ageratum (*Ageratum houstonianum*), Mexican snow ball (*Echeveria elegans*), and agave (*Agave*) from Latin America, betony (*Stachys officinalis*), begonia (*Begonia semperflorens*), and yucca (*Yucca filamentosa*) from South America, geranium (*Geranium*), and gazania (*Gazania*) from Africa, perilla (*Perilla frutescens*), angel's trumpets (*Datura*), and cockscomb (*Celosia cristata*) from the Far East, and plectranthus (*Plectranthus*) from Asia and Australia. The plants were grown densely and were changed many times during the vegetation period (Ill. 5).



Ill. 5. Flower decoration in the shape of a clock found in the square in the centre of Lviv. The face of the clock constitutes two species of permanently blooming begonia (photo by K. Rojek, 2013)

Modern flower forms present simpler shapes, but the number of the species used in the green areas is much bigger than hundreds of years ago. For over 200 years the following plants have been popular: geranium, begonia, flossflower, echeveria, irezyna, stonecrop, and red everlasting plant [7, 8, 9] (Tab. 2). The managers of historic buildings, parks or places of historic interest, or the authorities of spa resorts maintain the tradition of decorating the important places of a locality, by introducing and recapturing the patterns of flower forms from the past, [19, 30, 32]. As in the past, flower forms represent a park, a garden or a town, and they are their seasonal decorations.

 $$\operatorname{Table}$\ 2$$  The species of ornamental plants grown in modern floral forms  $\!\!\!\!^*$ 

No.	Species name	No.	Species name
1	Ageratum houstonianum	21	Lobelia erinus
2	Argyranthemum	22	Lobularia maritima
3	Bacopa spp.	23	Nikotiana alata
4	Begonia semperflorens	24	Osteospermum ecklonis
5	Begonia x hybrida	25	Pelargonium grandiflorum
6	Calibrahoa x hybrida	26	Pelargonium peltatum
7	Calluna vulgaris	27	Pelargonium zonale
8	Canna spp.	28	Petunia multiflora
9	Celosia plumose	29	Petunia x hybrida
10	Coleus spp.	30	Primula spp.
11	Dahlia x hortensis	31	Salvia nemorosum/farinacea
12	Dendranthema	32	Salvia splendens
13	Gaura spp.	33	Sedum spp.
14	Gazania splendens	34	Senecio cineraria
15	Helichrysum lanatum	35	Tagetes erecta
16	Helichrysum petiolare	36	Tagetes patula
17	Heliotropium spp.	37	Verbena x hybrida
18	Impatins neu-guinea	38	Viola cornuta
19	Ipomoea batatas	39	Viola x wittrockiana
20	Iresine herbsti	40	Zinnia elegans

<sup>\*</sup> Species indicated on the basis of the offers available in the web catalogues: http://plantpol.com.pl/katalogRo%C5%9Blin-765.html#/page/1, http://www.lobanowscy.pl/k,1,Rosliny\_balkonowe\_i\_rabatowe.html, http://diantpol.com/oferta.html

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