

Growing Orientals in the Colder Zones

By Emmett and Marie Wenger

Edmonton is located in zone 3a, with its outlying suburbs and nearby country communities in zone 2a. Zone 3a can experience winter temperatures of minus 34 to minus 40 degrees Celsius in the outlying areas. On the average, our frost free days, as stated in local references are approximately from May 6 to September 24, giving us a period of about 140 frost free days.

On a number of occasions we have tried different varieties of orientals planted into the ground in early spring. They would grow well and bloom in late September. Next year they would not emerge at all or a small stem would surface but not bloom. We concluded that the orientals were not hardy for our zone. Others grew them in pots in green houses, or grew them in pots, and stored these over winter in a cold room, or stored the bulb in the refrigerator. The latter two methods were not very successful because the lilies would start growing much sooner than desired for this zone.

As we continued to research growing orientals, we discovered that they were indeed hardy to our zones of 2 or 3 a. However, we were not successful in growing them because our season is not long enough for the bulb to sufficiently replenish itself to continue growing the next season. We will discuss our method and experiences of successfully growing orientals in pots but without the aid of a greenhouse or a cold room or storing the bulb in the refrigerator. Instead, we bury the pots in our garden in late October.

To initially start growing orientals, purchase several bulbs of different varieties from a reliable source. Individual bulbs are planted in two gallon, black, plastic pots such as are used in garden centers for roses and small shrubs. These are used for size, durability, and ease of handling. A smaller size pot is too small to grow the lily for several years. Certainly larger pots would even work better if one has the space and the strength to bring them out of the garden in the spring. The bulbs are planted in the pots about four to six inches deep in a mixture of 1/3 garden soil, 1/3 garden sand, and 1/3 peat moss. As the stems emerge and are growing, they are

fertilized with a 20 - 20 - 20 all purpose water soluble fertilizer daily with each watering, using about ¼ - ½ teaspoon of fertilizer per a two gallon watering can. Each lily is watered daily, preferably in the early morning, and possibly later as needed in warmer weather.

The pots sit on the walkway to the front door. This is a southeast location, receiving the early morning sun and going into shadow by about three o'clock in the afternoon. Therefore, the black pots do not get over heated in the later afternoon. We find this location very suitable for growing the orientals and also being able to enjoy their beauty and fragrance any time we are near the front of the house.

Once all the flowers are spent that part of the stem is clipped to prevent the formation of seedpods. The pots are then moved to a cooler, shadier area of the yard, in a north east location. Here they receive sunlight for a very short period in the early morning and then some sun from about 4 PM to about 8 PM. They are placed behind some containers of annuals, thus keeping the bulbs in the black pots much cooler. Lily bulbs kept in black plastic pots in the full sun for the whole summer will overheat and perhaps not thrive the next year. The bulbs are left to mature in this location for the rest of the summer. During this time, they are no longer fertilized but kept moist, however not wet. These pots do provide enough drainage in heavy rainfalls.

The stems are cut off in late September, once they start to yellow and have had a frost. The pots are dug into a south exposure garden at the end of October or even later, but before the first snow fall. To decrease some of the mud in early spring, each pot can be placed in a plastic grocery bag, not covering the surface. A row is marked off with stakes. A trench is dug between the stakes, just deep enough that the surface of the pots will be about two or three inches below ground level. The location of each pot is marked with a stake just at the periphery of the pot. We tend to make a map or write down the variety of the oriental in each pot. By doing this we can stagger the digging up of different varieties in the spring if we do not want

several pots of one variety to bloom at a time or we would like to exhibit a variety in a show. The pots are then buried in the soil, with the soil heaped up about 3 - 4 inches above the surface of the ground. This method seems to be quite sufficient to over winter the lilies since this area also usually has a snow cover of 2 - 3 feet. If we had less snow and still expected our freezing temperatures, than we would recommend a higher mounding of ground on top of the pots or buried deeper.

This type of method allows us to forget about these pots during the winter. Yet we are able to get the bulbs growing early in the spring, thus providing the growing season that they need to completely replenish the bulb in the fall.

Several pots are dug out at the end of March. If we want to stagger the blooming period, the rest are dug out by the middle of April. By this time the snow has melted in this area. If it has not, than we have the stakes and our map indicating the location of each pot. A shovel is used to pry up the pots. They usually pop out quite easily from the still frozen ground. If it is a sunny, warm day, the pots are left to thaw on the west patio for a few hours. They are then brought in and put on newspapers on the basement floor in a temperature of about 20 degrees Celsius. It takes them about two days to completely thaw out. They are checked and watered when needed. Stems start to surface in about a week. We do not worry if the stems do the surface for three weeks because we have been rewarded with extra sturdy stems from these pots. As soon as a pot is showing growth, it is brought into the family room and placed in front of the patio windows. At this point it is important to turn the pots each day so the stems are growing straight, especially if they are intended to be exhibited in a show. Again, if it is important that the stems be straight, they can also be staked, as they grow taller. Once the temperature outside during the day is about 8 degrees or higher, the pots are placed outside in their growing location and then put in the garage for the night. In our zone, this usually happens about middle to end of April. Therefore, the pots are not in the house for long periods. By the beginning of May the pots can be left out for the night except when there are warnings of frost. This year we

needed to slightly extend this period due to our cold spring. By the middle of May the lilies are about 18 - 24 inches tall. We have now reached full cycle. The lilies bloom in this location from early July to the first week of August.

We are very pleased with the success we have had in over wintering orientals year after year. We first tried this with Stargazer in 1994. It has now over wintered for five winters, with three stems and usually ten buds on a stem. We have also over wintered more Stargazer, Alma ata, and Journey's End. All of these had two or three stems each year with 6 - 10 buds. They were as vigorous this year. Our favorite is Alma ata, a white oriental with a light yellow center. To this point we have not transplanted these bulbs from their original pot. They do not seem crowded and since they show healthy stems each year, we feel there is no need for transplanting.

Last year we tried this method with *L. speciosum* var. *rubum*. Some growers in this zone have had success planting it directly in the ground. We planted one bulb in the ground and one in a pot. The bulb directly in the ground is about three weeks behind and may not flower this fall. This year we are trying this technique with more varieties of orientals such as Arena, Acapulco, Pompeii, Marco Polo, Mona Lisa, and Nippon. We did not have success with Casablanca using this method, however we could not establish if it was the bulb itself or the method. Another lily grower in zone 2a, North of Edmonton, tried this method last fall with Marco Polo, Stargazer, Berlin, and Arena. This year she reported that she had 100% survival using this method.

Is this a lot of work and fuss? We both immediately would say no it is not, and worth it for the pleasure of being able to grow orientals. We have many containers of plants, bury our tender roses, and grow our own bedding plants from seed. The little extra it takes to take care of these pots and bury them is well worth it. We would recommend this method for anyone who loves orientals and wants to over winter them without a green house, or a cold room, or keeping them in the refrigerator.