2018 Royal New Zealand Institute of **Horticulture Awards**

Plant Raisers' Award

Douglas (Doug) Grant



Doug Grant (RHS) being presented the Plant Raisers' Award by RNZIH President Dr Keith Hammett (LHS). Photo: Murray Dawson.

Doug Grant was born and raised in Palmerston North, attending Palmerston North Boys' High School before going on to Massey University to study Horticultural Science. He graduated with a BHortSc degree in 1977 and with a MHortSc(Hons) degree in 1983. In his post-graduate degree, he specialised in biometrical genetics.

His vacation employment included working two summers for West Auckland rose grower Frank Schuurman in his rose plant nursery and cut flower production unit. At that time Sam McGredy was operating his rose breeding programme from the Schuurman property.

Doug's research career began in 1977 with breeding maize and sweetcorn at the DSIR Crop Research field station at Otara which subsequently moved to Pukekohe.



Cucurbita maxima 'Pacific King'. Photo: Doug Grant.

In 1983 he took on the role of vegetable scientist / plant breeder at the Pukekohe Research Station. Initially he was involved in the research and breeding of onions, squash, asparagus and sweet potatoes. In 1992 with the formation of Crop & Food Research Crown Research Institute he became project leader for onion and cucurbit breeding and genetics projects.

Notable achievements for Doug during his time at the DSIR and Crop & Food Research included the development of bush plant habit pumpkin cultivars, improving storage life in buttercup squash, determining the factors involved in cucurbit fruit quality, improving onion storage and solving the industry's onion bulb shape problems. He was responsible for, or involved with, the release of 14 vegetable cultivars. The first cultivar was 'Rekavee' sweetcorn hybrid bred with Dr Ravi Bansal in 1981, followed by 'Kaboten' buttercup squash in 1991, two grey bush-type pumpkins, and then a series of hybrid and openpollinated brown and red skinned onions with improved quality and storage life.

In 1998, following a reorganisation of Crop & Food Research, Doug took redundancy and founded DNA Enterprises to provide research and consultancy services in the field of plant breeding and genetics.



Cucurbita moschata 'Butterkin'. Photo: Doug Grant.

Shortly afterwards he joined Hybrid Seed Company NZ Ltd as director of research and development continuing to work on the breeding of new onion and cucurbit hybrids. In the early days of Hybrid Seed Company he was developing high eating quality Cucurbita maxima types, both grey and red skinned. Grey crown-type storage pumpkins are the backbone of the New Zealand market. Hybrids bred for this market include the early maturing 'Pacific King' introduced in 1999 followed by 'Invincible' in 2004, 'Tudor Prince' in 2007, 'Windsor' in 2008, and recently 'Sovereign' in 2015. The red hybrids released included 'Orange Cutie' in 2003, 'Hubba Hubba' in 2005, 'Red October' in 2006 and 'Ambermax' in 2012.

The movement to international seed marketing led to the seed company becoming involved with developing ornamental pumpkins especially for the large North American Halloween market. The first introductions were 'Hannibal' and 'Chucky' in 2007. Eleven other ornamental hybrids have since followed. Doug was the first breeder to develop the "Super Freak™" type, a warted, creepy, freaky type of C. pepo pumpkin for this market. The first two hybrids in this series, 'Knucklehead' and 'Goosebumps', were introduced in 2008. These have since been followed by four more, including 'Baby Bumps' in 2014 and 'Grizzly Bear' in



Cucurbita pepo 'Knucklehead'. Photo: Doug Grant.

2017. Doug has now bred a full range of other ornamental types of varying sizes, shapes, colours, and disease tolerances for this market. High quality C. moschata squash hybrids, mainly butternuts, have also been developed for yield, eating quality, storage life and for tolerance to powdery mildew and other diseases. From an 'outside the square' idea, Doug bred the oblate fruit shaped, tan-coloured 'Butterkin', a C. moschata hybrid that resembles a cross between a butternut and a squash. Fruits of this hybrid have been grown and marketed in New Zealand since 2013.

Onion breeding has been a long and slow progress for Doug. The breeding has been focused on intermediate day-length storage types that are brown, dark brown and red skinned. A lot of Doug's work over the past 20 years has been in the development of cytoplasmic male sterile and maintainer lines for future use as hybrid parents. A series of six long storage brown and dark brown hybrids with improved uniformity have been released during this period of time.

Doug is also well known in the world of roses as a notable breeder. He began breeding roses in the 1970s

during his student days. He still regards himself as a hobby breeder even though his programme has now become somewhat larger than that. Early on with the propagation of his seedlings, he was introduced to the dreaded Rose Mosaic Virus. That encouraged him to dabble in developing understock lines that were free of known viruses. This was helped by having virologist Phil Gardner as a fellow student at Massey at the time.

Doug's major aim is to breed low maintenance roses with disease tolerance being the main objective. The Pukekohe climate, particularly with its high humidity and rainfall, is a disease paradise and very useful to assist with selection. It soon shows up any seedlings that do not meet the grade. Doug's first rose that was commercially released was the scarlet coloured floribunda 'Millennium' (GRAlove), also known as 'Everlasting Love'. This was a Silver Star award winner in the Palmerston North trials in 1997 and New Zealand Rose of the Year winner in 2001.

Doug has spent time on breeding compact climbing roses that have plenty of blooms but are less

vigorous than others on the market. Cultivars released include 'All My Love' (GRAkita), 'Cherry Kisses' (GRAchloe) and 'Candy Kisses' (GRAemma). He has gained awards at both the Palmerston North and Hamilton Rose Trials and has had his seedlings trialled overseas.

Doug's plant breeding work has improved both ornamental and vegetable cultivars and the Royal New Zealand Institute of Horticulture has great pleasure in awarding the Plant Raisers' Award and medal to Doug Grant for Cucurbita maxima 'Pacific King', C. moschata 'Butterkin', C. pepo 'Knucklehead', and Rosa 'Millennium'.



Rosa 'Millennium' (syn. R. 'Everlasting Love'). Photo: Doug Grant.

Citation prepared by **Hayden Foulds**

Fellow of the Royal New Zealand Institute of Horticulture (FRIH)

David Dennison Askin



David Askin (RHS) being presented with his FRIH award certificate by RNZIH President Dr Keith Hammett (LHS). Photo: Murray Dawson.

David Askin commenced his lifelong career in horticulture and parks and recreation as an apprentice with the Christchurch City Council Parks and Recreation Department in 1973. After completing his apprenticeship and gaining his Trade Certificate and National Certificate in Horticulture he continued his employment with the Department as a Journeyman.

He then became Head Gardener with the Christchurch International Airport Authority in 1977 and in 1978 moved to Invercargill as Queens Park Supervisor with the Invercargill City Council Parks and Recreation Department for six years. He then moved to the North Island to take on the role of Borough Parks Manager in Cambridge from 1984 to 1989.

In 1989 David was appointed to the now titled position of Open Spaces Manager (was Superintendent of Parks) with the Ashburton District Council taking over from the late lan Bonisch, a position he continues to hold today.

The extent of his responsibilities includes leading and developing a staff of 31 and managing contractors for outsourced services. He manages and undertakes planning and design to establish and improve the urban and rural environment, and is involved with district-wide biodiversity matters. Management and administration of the Department of Open Spaces includes writing and implementing plans, policies and strategies, as well as managing budgets.