Supplemental data for

Weise, S., Blattner, F. R., Börner, A., Dehmer, K. J., Grübe, M., Harpke, D., Lohwasser, U., Oppermann, M., Stein, N., Willner, E., Nagel, M. (2025). The German Federal Ex Situ Genebank for Agricultural and Horticultural Crops – Conservation, exploitation and steps towards a biodigital resource centre. *Genetic Resources* (S2), 91–105. doi: 10.46265/genresj.GYDY5145.

Supplemental Table 1: Collecting trips by German-speaking researchers. This includes collecting trips involving the institute itself as well as those from which material was obtained by way of seed exchange or which was incorporated into the collections at a later date. The table is based on information of (Hammer et al. 1994) and (Hammer 2020) and has been expanded by information from the genebank archives to include additional collections. Only collecting trips from which at least 30 accessions are currently preserved in the German genebank are listed. This list does not claim to be exhaustive and is constantly being updated.

Year(s)	Collecting area	Collector(s)		
1922-1932	Alpine region	E. Mayr; Alpine landrace collection; integrated into the genebank from 1964		
1928-1932	Anatolia	K.O. Müller, M. Klinkowski, O. Schwarz, A. Scheibe and others; Expeditions of the Biological Research Centre Berlin-Dahlem in the context of the establishment of agricultural research facilities in Turkey		
1935-1936	Hindu Kush	A. Scheibe, K. v. Rosenstiel, W. Roemer and others; German Hindu Kush Expedition; integrated into the genebank from 1946		
1937-1938	Northwest India/Nepal	A. Herrlich and others		
1938-1939	Tibet	E. Schäfer, K. v. Rauch; German Tibet Expedition		
1941-1942	Albania, Greece (incl. Crete), Yugoslavia, Hungary	H. Stubbe and others; Balkan collecting trips; integrated into the genebank from 1943		
1950	Southern Italy	R. Maly, G. Pascher		
1952-1954	Iran	H. Kuckuck; six FAO collecting trips; integrated into the genebank from 1956		
1956/1958/1959	China	H. Stubbe, R. Mansfeld, H. Böhme, S. Danert, P. Hanelt and others; three journeys, first major collecting trips of the Gatersleben institute		
1958	El Salvador, Guatemala, Honduras	F. Schwanitz; Central America collection; integrated into the genebank from 1960		
1959/1960	Ethiopia	H. Kuckuck; integrated into the genebank from 1960		
1962/1964	Mongolia	H. Böhme, S. Danert and others		
1974/1977/1981	Slovakia and Moravia	P. Hanelt, K. Hammer, J. Schultze-Motel and others; landrace collections		
1975/1980	East Germany	K. Hammer, P. Hanelt, C. Tittel and others; landrace collections		
1976/1978	Poland	P. Hanelt, J. Schultze-Motel; landrace collections		
1977	Georgia	K. Hammer, P. Hanelt		
1978	Southwest Spain	C. Lehmann, K. Hammer and others		

1980-1992	,,	K. Hammer, C. Lehmann, P. Hanelt and others;	
	Italy, Sicily	various collecting trips	
1981-1990	Georgia	P. Hanelt, J. Kruse, R. Fritsch and others; various landrace collections	
1981/1982/1983	Libya	K. Hammer, C. Lehmann and others; three collecting trips	
1982/1983/1986	Austria	C. Lehmann, F. Scholz, R. Schachl, W. Kainz and others; landrace collections	
1982/1983	Ethiopia	R. Steuckardt	
1983	Ethiopia	H. Mebus	
1983/1984/1987	Tadzhikistan	P. Hanelt, R. Fritsch and others; various collecting trips	
1984	Ethiopia	C. Lehmann	
1984	Poland	K. Hammer; landrace collection	
1985/1987	Mongolia	P. Hanelt, J. Kruse, K. Pistrick and others	
1985-1997	Central Asia (Tajikistan, Uzbekistan, Kazakhstan,	P. Hanelt, R. Fritsch, K. Pistrick, M. Fischer, F. Speta; various collecting trips	
4005 4000	Kyrgyzstan, Turkmenistan)	William and the second sections of the second section section sections of the second section section sections of the second section section section sections of the section section section section sections of the section section section section sections of the section sec	
1985-1989	North Korea	K. Hammer; various collecting trips	
1985/1986 1986-1993	Iraq Cuba	K. Hammer; various collecting trips	
	China	K. Hammer, T. Gladis; various collecting trips	
1986/1988	Cillia	P. Hanelt; together with Botanical Institute of the Academia Sinica	
1988	Colombia, Peru	K. Hammer, G.K. Müller	
1991	Altaj	K. Pistrick	
1992/1993	•	K. Pistrick	
1992/1993/1994	Romania	K. Hammer, H. Rosso, K. Pistrick, N. Friesen;	
1552/1555/1554	Nomania	various trips	
1993/1995	Sardinia	K. Hammer, T. Gladis	
1993/1994/1995		K. Pistrick, K. Hammer, T. Gladis; various trips	
1993	Poland	E. Willner	
1994	Iran	R. Fritsch	
1994-2000	Italy	K. Hammer; various trips	
1994-1998	Spain (Canary Islands,	J. Keller, K. Pistrick, K. Hammer, R. Fritsch, G.	
	Mallorca, southern Spain)	Kern and others; various trips	
1995	Turkey	R. Fritsch, N. Friesen	
1995	- / - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1	,	
	Germany (Altmark)	E. Willner	
1995	Germany (Altmark) South Uzbekistan	·	
1995 1996/1997	South Uzbekistan Croatia	E. Willner	
1996/1997 1997	South Uzbekistan Croatia South Tibet	E. Willner K. Pistrick E. Willner; two journeys S. Beck	
1996/1997 1997 1998	South Uzbekistan Croatia South Tibet Bulgaria	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege	
1996/1997 1997 1998 1999	South Uzbekistan Croatia South Tibet Bulgaria Northern Spain	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege E. Willner, B. Schmidt	
1996/1997 1997 1998 1999 1999	South Uzbekistan Croatia South Tibet Bulgaria Northern Spain Azerbaijan and Iran	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege E. Willner, B. Schmidt L. Frese and others	
1996/1997 1997 1998 1999 1999 2001	South Uzbekistan Croatia South Tibet Bulgaria Northern Spain Azerbaijan and Iran France	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege E. Willner, B. Schmidt L. Frese and others E. Willner, B. Schmidt	
1996/1997 1997 1998 1999 1999 2001 2002-2010	South Uzbekistan Croatia South Tibet Bulgaria Northern Spain Azerbaijan and Iran France Georgia	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege E. Willner, B. Schmidt L. Frese and others E. Willner, B. Schmidt K. Pistrick, R. Fritsch, B. Gemeinholzer and others; various collecting trips	
1996/1997 1997 1998 1999 1999 2001 2002-2010	South Uzbekistan Croatia South Tibet Bulgaria Northern Spain Azerbaijan and Iran France Georgia Ireland	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege E. Willner, B. Schmidt L. Frese and others E. Willner, B. Schmidt K. Pistrick, R. Fritsch, B. Gemeinholzer and others; various collecting trips E. Willner, B. Schmidt	
1996/1997 1997 1998 1999 1999 2001 2002-2010	South Uzbekistan Croatia South Tibet Bulgaria Northern Spain Azerbaijan and Iran France Georgia Ireland Bavarian Forest /	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege E. Willner, B. Schmidt L. Frese and others E. Willner, B. Schmidt K. Pistrick, R. Fritsch, B. Gemeinholzer and others; various collecting trips	
1996/1997 1997 1998 1999 1999 2001 2002-2010 2002 2006	South Uzbekistan Croatia South Tibet Bulgaria Northern Spain Azerbaijan and Iran France Georgia Ireland Bavarian Forest / Bohemian Forest	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege E. Willner, B. Schmidt L. Frese and others E. Willner, B. Schmidt K. Pistrick, R. Fritsch, B. Gemeinholzer and others; various collecting trips E. Willner, B. Schmidt E. Willner	
1996/1997 1997 1998 1999 1999 2001 2002-2010 2002 2006	South Uzbekistan Croatia South Tibet Bulgaria Northern Spain Azerbaijan and Iran France Georgia Ireland Bavarian Forest / Bohemian Forest Jordan	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege E. Willner, B. Schmidt L. Frese and others E. Willner, B. Schmidt K. Pistrick, R. Fritsch, B. Gemeinholzer and others; various collecting trips E. Willner, B. Schmidt E. Willner I. Thormann, U. Lohwasser and others	
1996/1997 1997 1998 1999 1999 2001 2002-2010 2002 2006	South Uzbekistan Croatia South Tibet Bulgaria Northern Spain Azerbaijan and Iran France Georgia Ireland Bavarian Forest / Bohemian Forest	E. Willner K. Pistrick E. Willner; two journeys S. Beck E. Willner, B. Schmidt, K. Wiege E. Willner, B. Schmidt L. Frese and others E. Willner, B. Schmidt K. Pistrick, R. Fritsch, B. Gemeinholzer and others; various collecting trips E. Willner, B. Schmidt E. Willner	

Supplemental Table 2: Recent third-party-funded projects under participation of the IPK genebank.

Acronym	Funding agency	Time period	Aim	Crops
EURISCO	ECPGR	2014– 2028	Hosting and maintenance of the European Search Catalogue for Plant Genetic Resources	All maintained in European PGR collections
GrassLandscape	EC	2015- 2018	Bridging landscape genomics and quantitative genetics for a regional adaptation of European grasslands	Perennial ryegrass
DRYeGRASS	BLE	2016- 2018	Genetic analyses of drought stress tolerance	Perennial ryegrass
GrasFest	BLE	2017- 2020	Phenotypic screening of seed retention and histological analyses	Perennial ryegrass and meadow fescue
EUCLEG	EC	2017– 2021	Breeding forage and grain legumes to increase EU's and China's protein self-sufficiency	Legumes
Farmer's Pride	EC	2017– 2021	Networking to enhance <i>in situ</i> conservation of European PGR	No specific
GenRes Bridge	EC	2019– 2021	Joining Forces for genetic resources and biodiversity management	No specific
InnoLuteus	FNR	2019– 2022	Improving cultivation of yellow lupin	Yellow lupin
LinSel	BLE	2019– 2022	Selection of lentil genotypes suited for sustainable cropping systems	Lentil
P Starch	FNR	2019– 2022	Assessment of nitrogen uptake efficiency in starch potatoes	Potato
P Legumes	WGL	2019- 2023	Analysis of P efficiency in forage legumes and their capacity to utilize P from recycling products	Alfalfa, red clover
EffiKar	BLE	2020- 2024	Assessment of nutrient uptake efficiency in table varieties	Potato
AGENT	EC	2020– 2025	Development of an activated genebank network	Mainly wheat and barley
INCREASE	EC	2020– 2026	Development of new approaches for conserving, managing and characterising PGR	Legumes
EVA	ECPGR	2021– 2022	Development of technical infrastructure of the European Evaluation Network	Carrot, legumes, lettuce, maize, pepper, wheat and barley
SPITFIRE	Cornet	2021– 2024	Screening of pea accessions for PNYDV resistance	Pea
LuzNutz	BLE	2021- 2024	Exploring genetic diversity and improving cultivation of alfalfa	Medicago sp.
PotEND	DFG	2022– 2025	Evaluation of endophytes in potato cryosamples	Potato
PreLuteus	FNR	2022– 2025	Development of high-yielding and resistant pre-breeding lines of yellow lupin	Yellow lupin

CiLaKlima	BLE	2022– 2025	Screening of genetic resources of chickpea and grass pea	Chickpea, grass pea
PRO-GRACE	EC	2023– 2025	Development of a concept for a European Research Infrastructure for PGR	No specific
Garli-CCS	ECPGR	2023– 2025	Development of a garlic conservation and cryopreservation strategy	Garlic
WiLGer	BLE	2023– 2026	Winter lentil genetic resources to breed winter lentils	Lentil
SiMultAnG	BLE	2023– 2026	Ensuring multifunctionality in forage production through species richness in intensive grasslands	Various crops
Legume Generation	EC	2023– 2027	Boosting innovation in breeding for the next generation of legume crops for Europe	Legumes
Wick4 Pig	BLE	2023– 2028	Seed vetch grains for fattening pigs as an alternative high-protein feedstuff under changing climatic conditions	Vetch
COUSIN	EC	2024– 2028	Development of a roadmap for using CWR for breeding and farming	Cereals, legumes, leafy greens, vegetables, oilseed crops
ObiVonKnobi	BLE	2024– 2028	Pheno-/chemotypic evaluation and utilisation of garlic	Garlic
DiPisum	BMBF	2024– 2028	Digitalisation-driven development of Saxony-Anhalt into an innovation hub for pea breeding, cultivation and processing	Pea
KarOLa	BLE	2024- 2029	Assessment of nutrient uptake efficiency and drought stress tolerance	Potato
POMORROW	BMBF	2025- 2029	Improving genetic traits using potato genetic resources and new breeding techniques	Potato

Hammer K (2020) Die Genbanken sind eine Notaufnahmeklinik und eine Arche Noah für das Überleben der Kulturpflanzenvielfalt. In: Porges K, Lux S (eds) Geschichte der Biogeographie, vol 22. Verhandlungen zur Geschichte und Theorie der Biologie. Deutsche Gesellschaft für Geschichte und Theorie der Biologie, pp 111-140

Hammer K, Gäde H, Knüpffer H (1994) 50 Jahre Genbank Gatersleben - eine Übersicht. Vorträge für Pflanzenzüchtung 27:333-383