

Making a Healthier
Future with BIONEER

Investor Relations 2021



Introduction to

BIONEER

Innovation • Value • Discovery

“Making a Healthier Future for Humanity with Genomic Technology”

JUNE 2021

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Disclaimer

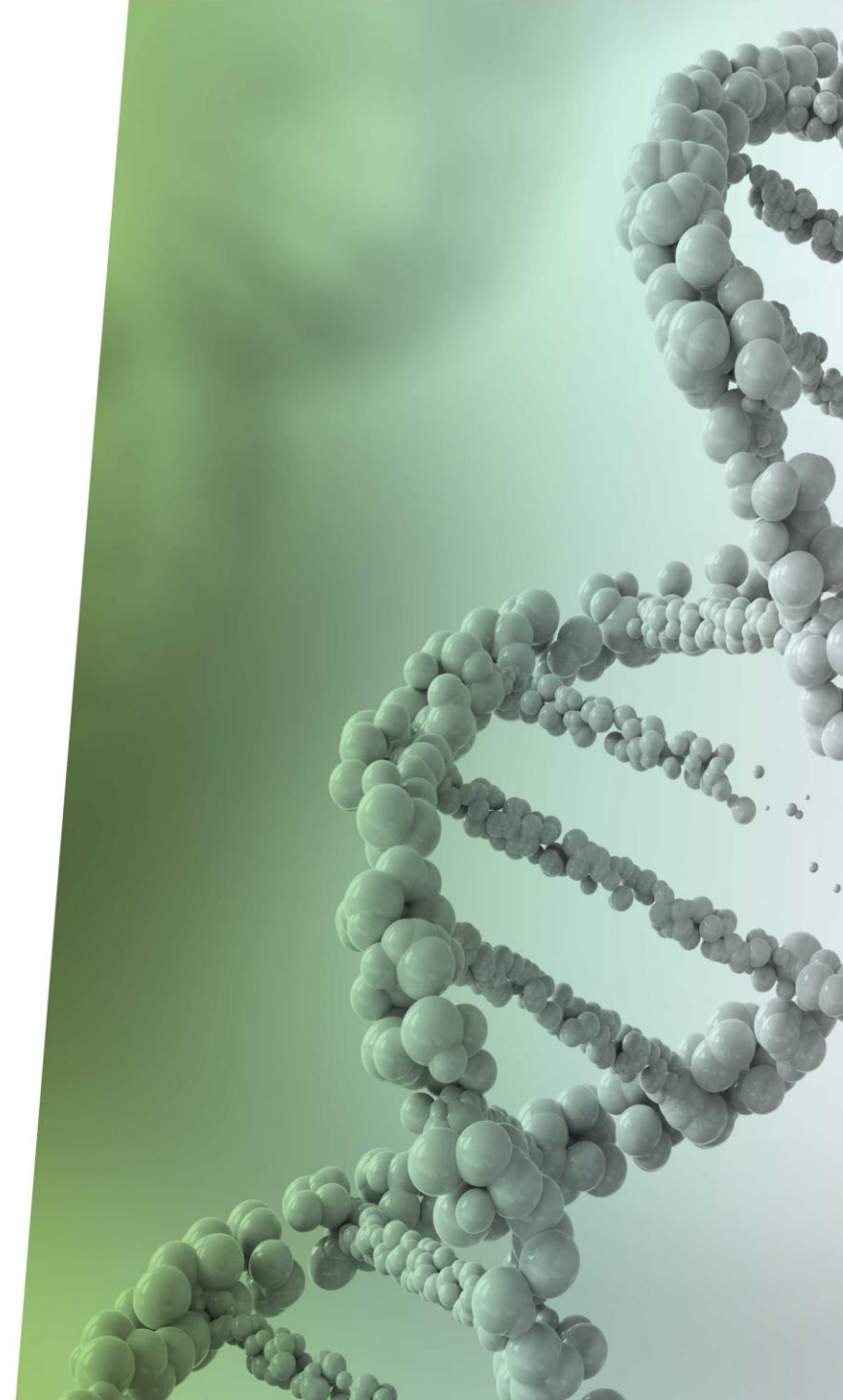
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Making a Healthier Future with BIONEER





I. Company Overview

Company Profile

Name	Bioneer Corporation
CEO	Han-Oh Park
Established	Aug. 28, 1992 (KOSDAQ, listed on Dec. 29, 2005)
Capital	KRW 12.6 Billion
Employees	575 (as of Mar. 31, 2021)
Business	Molecular Diagnostics, Probiotics, and RNAi New Drugs
Located	Daejeon, South Korea
Webpage	www.bioneer.com

Credit Ratings

Date	Credit Ratings	Cashflow Ratings
Apr. 29, 2021 (FY 2020)	BBB- (Investment Grade)	CR-3

Great	Good	Poor	Speculative	Risky	Default
AAA ~ A+	A ~ BBB-	BB+ ~ B-	CCC+ ~ CCC-	CC ~ D	N/A

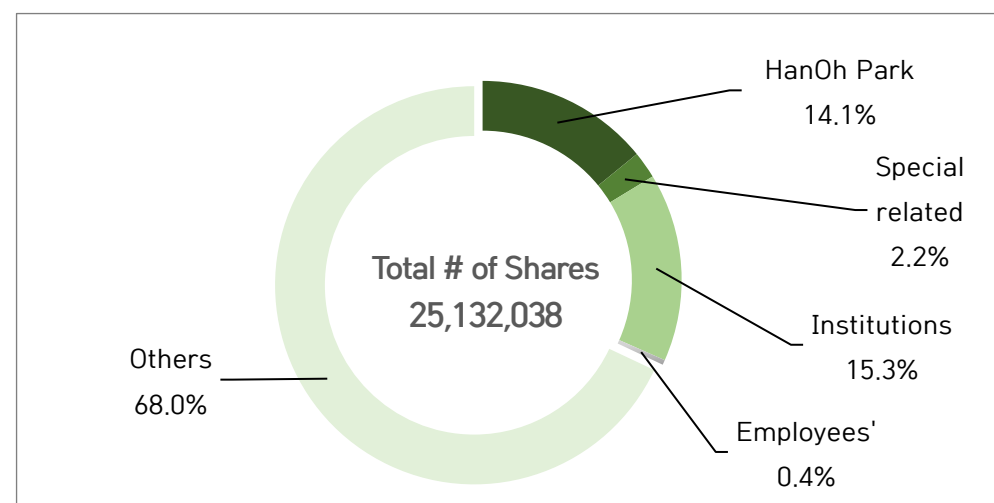
CEO Profile



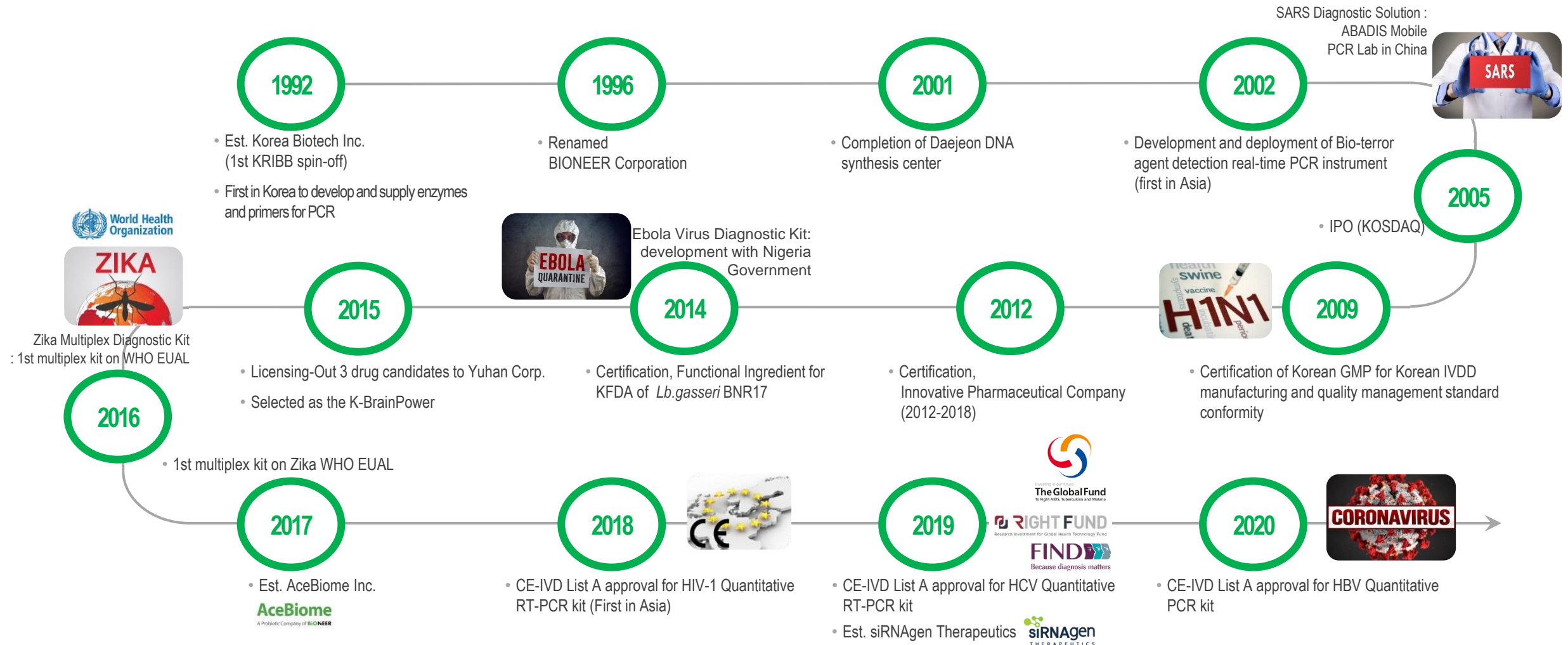
President & CEO **HAN-OH PARK**

- B.S. Chemistry, Seoul National University (84')
- Ph.D. Biochemistry, KAIST (92')
- Vice President, Korea Biotechnology Industry Organization
- Adjunct Professor, KAIST
- Committee Member, Presidential Advisory Council on Science & Technology

Shareholders (as of Dec. 31, 2020)



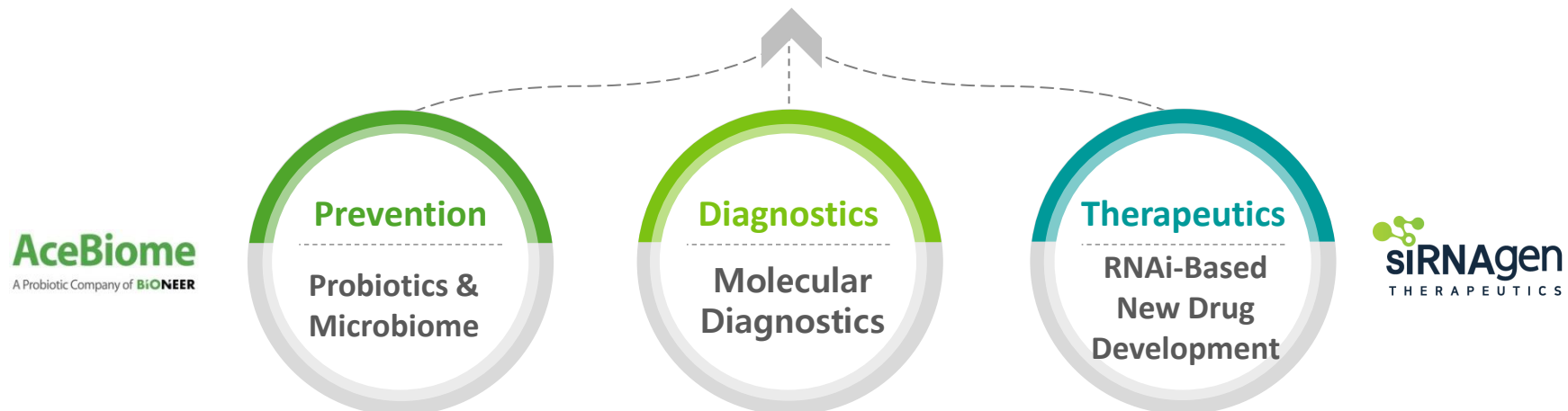
Growing as a Company that Contributes to Human Health in the Super-aging Era



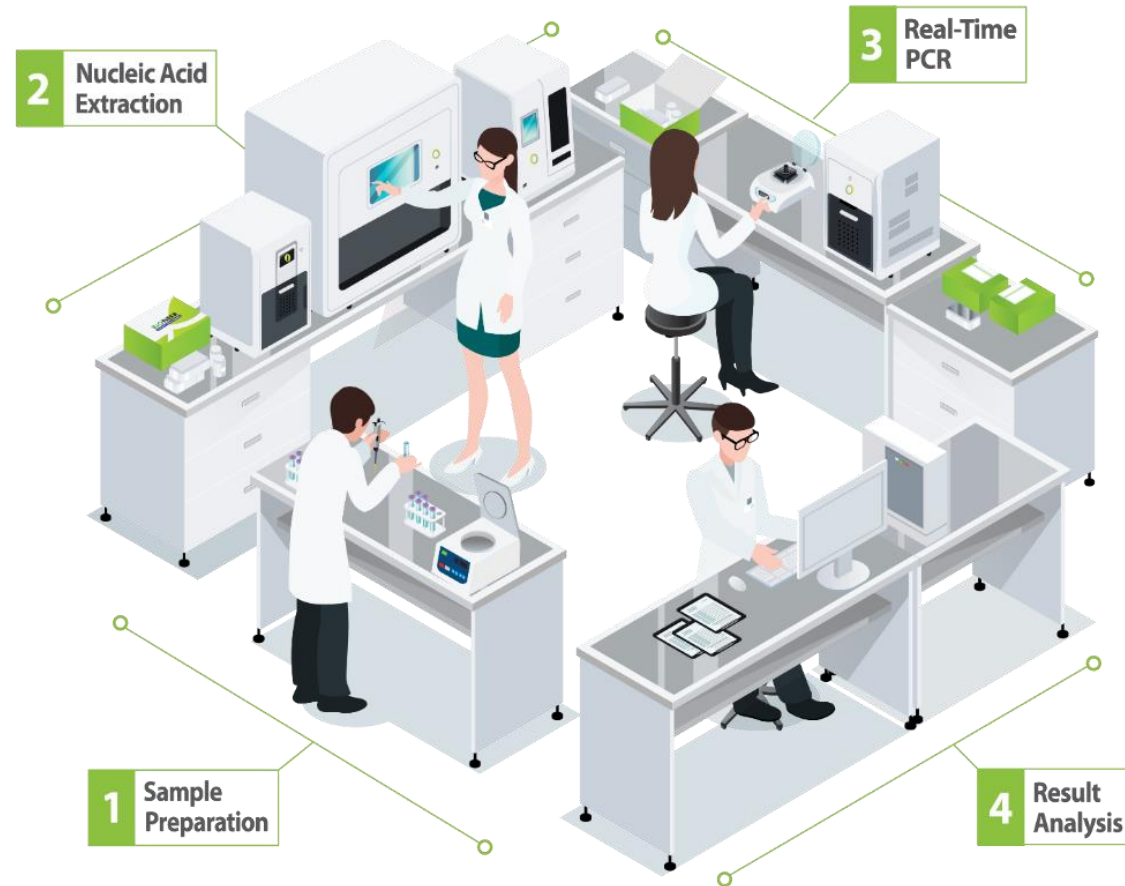
Global Healthcare Company Encompassing Prevention, Diagnostics, and Therapeutics



// Healthcare Innovator //



Providing Optimized Diagnostic Environment

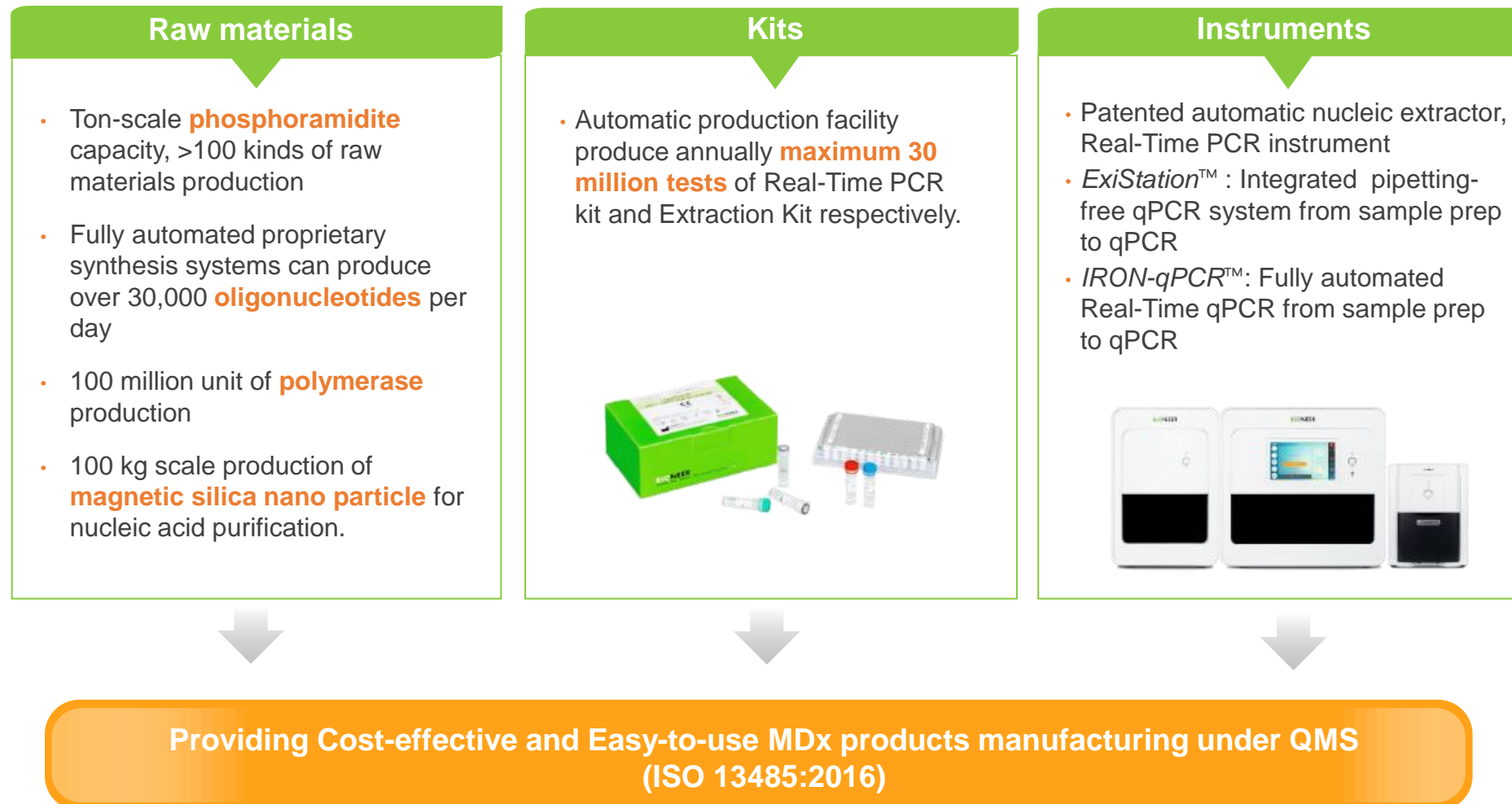


ExiStation™
Health Center
(Local Hospital)

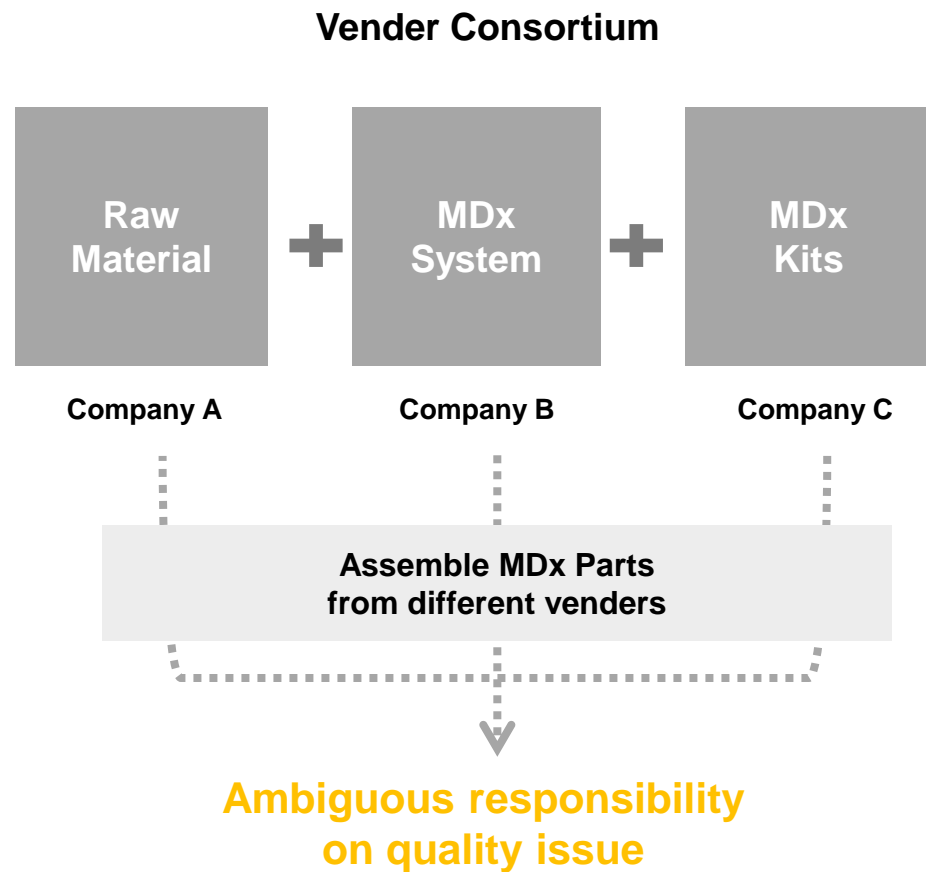
ExiStation™ 48/48A
General Hospital

**ExiPrep™ 96 Lite
& Exicycler™ 96**
Central/National
Reference Lab

BIONEER has been developing from raw materials and kits to instruments since 1992



Providing One-Stop Total Solution with Integrated Quality



VS



Reagents and Kits (total 60)

No	Application no.	Patent no.	Title	Registered	Pending
1	10-1999-004361	KR 0292883	Hot start PCR Mixture Comprising Pyrophosphate and Pyrophosphatase	KR	
2	10-2007-109055	KR 1098764	Dried Composition for hot-start PCR with Long-Term Stability	KR, US, BR, IN, CN	
3	10-2011-0011639	KR 1818126	Reverse transcriptase having improved thermostability	KR(3), US, EP(GB, FR, DE), JP, CN	
4	10-2013-0025119		Compositions for hot start reverse transcription reaction or hot start reverse transcription polymerase chain reaction	EP(GB, DE, FR, CH), JP, AU, RU	KR, US, CN, CA, IN, BR
5	10-2013-0091821	KR 1717953	New azo compound, use thereof, and process for preparing of the same	JP	EP, US, CN

Amplification System (total 91)

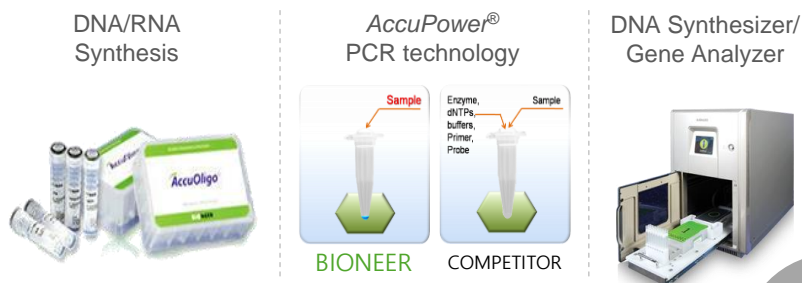
No	Application no.	Patent no.	Title	Registered	Pending
1	10-2005-7018766	KR 0794703	Real-time monitoring apparatus for biochemical reaction	KR, US, JP, CN	EP
2	10-2007-064558	KR 1089045	Real-time PCR monitoring apparatus	KR, US, JP, CN, EP (GB, DE, FR, IT)	
3	10-2010-0021532	KR 1423936	Universal automatic apparatus for real time monitoring products of nucleic acid amplification reaction and method thereof	KR, RU, JP, AU, ID	US, EP, CA, IN, BR, , TH, TR, CL
4	10-2010-0105630	KR 1420094	Automatic Real-time PCR system for the various analysis of biological sample	KR, US, JP, CN, RU	EP, IN

Purification System (total 45)

No	Application no.	Patent no.	Title	Registered	Pending
1	10-2011-0041126	KR 1443727	Automatic purification apparatus with magnetic field applying part for biological samples preparation and isolation method of target material from biological samples, and protein expression and purification method	KR, US, RU, ID	EP, IN, BR, TH, TR
2	10-2012-0138335	KR 155534	Automatic cell-free protein production instrument	KR	
3	13858370.3		Automatic cell-free protein production instrument and protein production method using the same	JP, RU, AU	EP, US, CN, IN
4	10-2014-0174256		Magnetic particle separation device and method for separating and purifying nucleic acid or protein		KR, US, EP, CN, JP

Life Science Research

- ✓ Sustained and stabilized revenue growth with more than 3,000 customers



Molecular Diagnostics

- ✓ CE-IVD List A approval for Viral Load Test Kit (HIV, HBV, HCV) (First in Asia)



RNAi New Drug (SAMITMRNA)

- ✓ GLP toxicology studies of IPF was completed.
 - Two-track approach for new drug and healthcare products development
 - Strong intellectual property position of siRNA and SAMiRNA and Powerful siRNA delivery platform technology for various diseases
 - Joint research partnership with Yuhan Corp. and global pharmaceutical companies
 - Establish subsidiary: siRNAgen Therapeutics Corp. (2019.08)

Probiotics & Microbiome

- ✓ 2018, Global licensing agreement
 - Isolation of *Lb. gasseri* BNR17 from human breast milk (2006.08)
 - Approved as functional ingredients with body fat reduction for functional foods by KFDA
 - Establish subsidiary: AceBiome Inc. (2017.04)
 - Global licensing agreement and supply contract





II. COVID-19 Assay

COVID-19

COVID-19 & Flu
Simultaneous
Diagnostics

COVID-19
Variants
Identification

AccuPower® RV1 Multiplex Kit

✓ Compatible with various system



Exicycler™ 96
(BIONEER)



CFX 96
(Bio-Rad)



ABI7500fast
(Thermo-Fisher)



Quantstudio 5
(Thermo-Fisher)

AccuPower® RV1 Real-Time RT-PCR Kit

✓ Convenience & Safe test using ExiStation™ system



ExiStation™ (BIONEER)



ExiStation™48 (BIONEER)

COVID-19

COVID-19 & Flu
Simultaneous
Diagnostics

		Master Mix Reagent			Vacuum Dried Premix Reagent		
Product		COVID-19	COVID-19 Multiplex	COVID-19& Influenza Multiplex	COVID-19	COVID-19 Multiplex	COVID-19& Influenza Multiplex
		AccuPower® SARS-CoV-2 Real-Time RT-PCR Kit	AccuPower® SARS-CoV-2 Multiplex Real-Time RT-PCR Kit	AccuPower® RV1 Multiplex Kit	AccuPower® COVID-19 Real-Time RT-PCR Kit	AccuPower® COVID-19 Multiplex Real-Time RT-PCR Kit	AccuPower® RV1 Real-Time RT-PCR Kit
Cat.No.		SCV-2112	SCVM-2112	RV1-2112	NCV-1111	NCVM-1111	RV1-1111
Targets		E, RdRp gene	E, RdRp, N gene	COVID-19 : E , RdRp, N gene	E, RdRp gene	E, RdRp, N gene	COVID-19 : E , RdRp, N gene
				Influenza : Influenza A, B			Influenza : Influenza A, B
Advantages		Compatible with various system Any method are available from manual extraction to automatic extraction			Only for BIONEER's MDx system Convenience & Safe test using <i>ExiStation™</i> series		
Feature	Extraction	<i>ExiPrep™</i> series (Auto) <i>MagListo™</i> (Manual) <i>AccuPrep®</i> (Manual)			<i>ExiStation™</i> (BIONEER) <i>ExiStation™</i> 48 (BIONEER)		
	Real-Time PCR	<i>Exicycler™</i> 96 (BIONEER) ABI 7500 fast (Thermo Fisher) CFX 96 (Bio-Rad)	<i>Exicycler™</i> 96 (BIONEER) ABI 7500 fast(Thermo Fisher) CFX 96(Bio-Rad) Quant studio 5 (Thermo Fisher)				
Tube / test		2 Tube	1 Tube		2 Tube	1 Tube	
Hands-on step		•Some hands-on steps for making and dispensing the mixture			•Minimized hands-on step by using ExiStation system •Pre-filled cartridge type extraction kit •All Real-Time PCR reagents are pre-aliquot within a tube		



SARS-COV-2 MOLECULAR ASSAY EVALUATION: RESULTS

INFORMATION FROM WWW.FINDDX.ORG/COVID-19/SARSCOV2-EVAL-MOLECULAR/MOLECULAR-EVAL-RESULTS/
LAST UPDATED: 3 JULY 2020

FIND conducted independent evaluations at the [University Hospitals of Geneva \(HUG\)](#) to verify the limit of detection (LOD) – as reported by the manufacturers – and the clinical performance of the following manual molecular test kits. The LOD analysis was performed using cultured viral stocks from a clinical isolate from Switzerland that was quantified using an E gene standard. The clinical performance analysis was conducted on extracted samples from individuals suspected to have COVID-19 that were tested using an in-house PCR protocol that was optimized based on the Tib Molbiol assay.

Data for all the tests selected for the first round of the evaluations are summarized below (Table 1). Tests were selected for evaluation according to [scoring criteria](#), but the order in which the evaluations were conducted does not reflect any endorsement or prioritization.

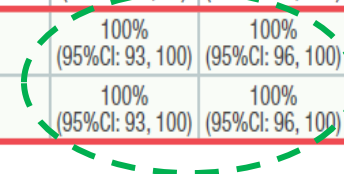
Additionally, a limited clinical performance evaluation of the Cepheid Xpert Xpress SARS-CoV-2 assay was also performed at the HUG. A second collaborating site, the Translational Health Science and Technology Institute (THSTI) conducted a similar limited clinical performance evaluation of the Molbio TrueNat SARS-CoV-2 assay. Results on the performance of these automated near-POC assays are shown in Table 2.

For questions relating to the evaluation of molecular tests, please contact our [Emerging Threats team](#)

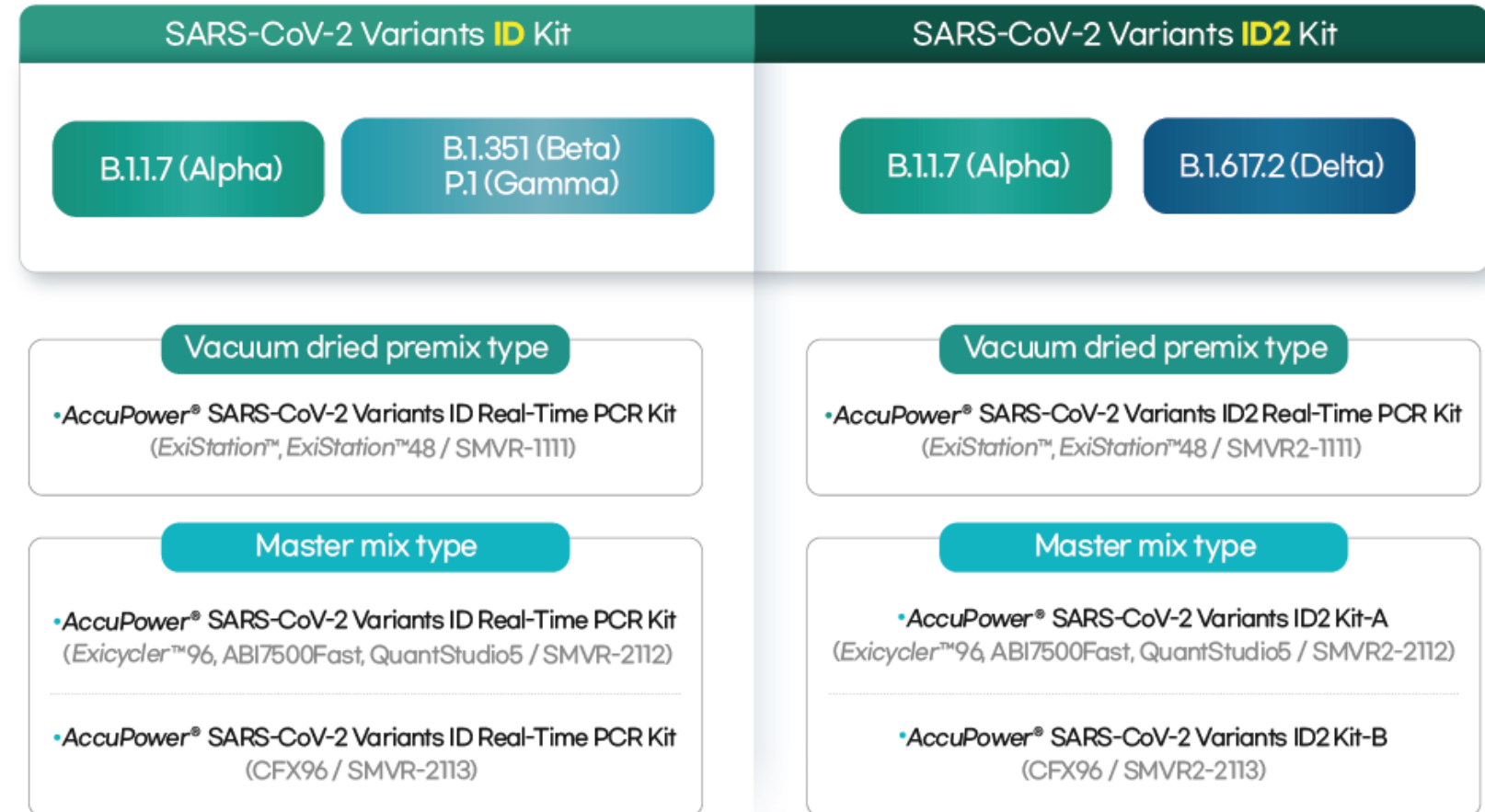
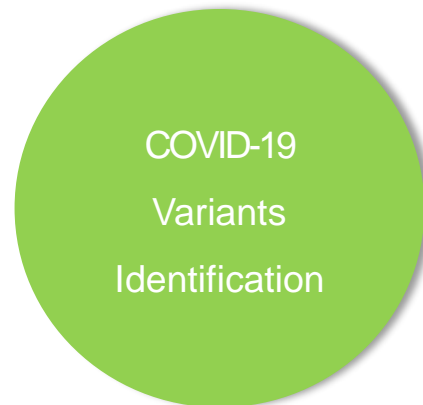
[Visit the COVID-19 diagnostics resource centre](#)

TABLE 1: Results for 21 manual (open) molecular tests included in the round 1 evaluation

Company	Product name	Product number	Gene target	Verified LOD (copies / reaction)	Avg Ct (lowest dilution 10/10)	Clinical sensitivity (50 positives)	Clinical specificity* (100 negatives)	Lot No.	PCR platform**	Supplier recommended Ct cut-off
bioMérieux SA	ARGENE® SARS-COV-2 R-GENE® [b]	423720 (CE-IVD)	N	10–50	36.44	100% (95%CI: 93, 100)	100% (95%CI: 96, 100)	1007989610 1007947520	BioRad CFX96 deep well	Any signal considered as positive
		423717 (RUO)	RdRP	10–50	32.44	96% [a] (95%CI: 87, 99)	100% (95%CI: 96, 100)			
Bioneer Corporation	AccuPower® SARS-CoV-2 Real-Time RT-PCR Kit	SCV-2122	E	10–50	35.85	100% (95%CI: 93, 100)	100% (95%CI: 96, 100)	200931E	BioRad CFX96 deep well	<38
			RdRP	10–50	36.18	100% (95%CI: 93, 100)	100% (95%CI: 96, 100)			



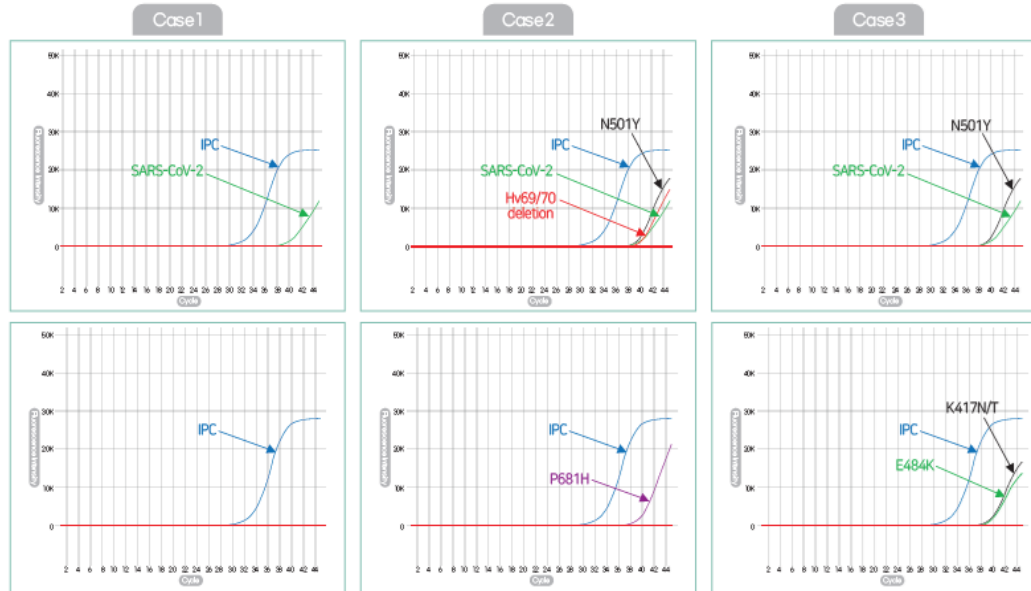
► BIONEER's Identifying of SARS-CoV-2 Variants



► BIONEER's Identifying of SARS-CoV-2 Variants

• SARS-CoV-2 Variants ID Kit

Variants 1

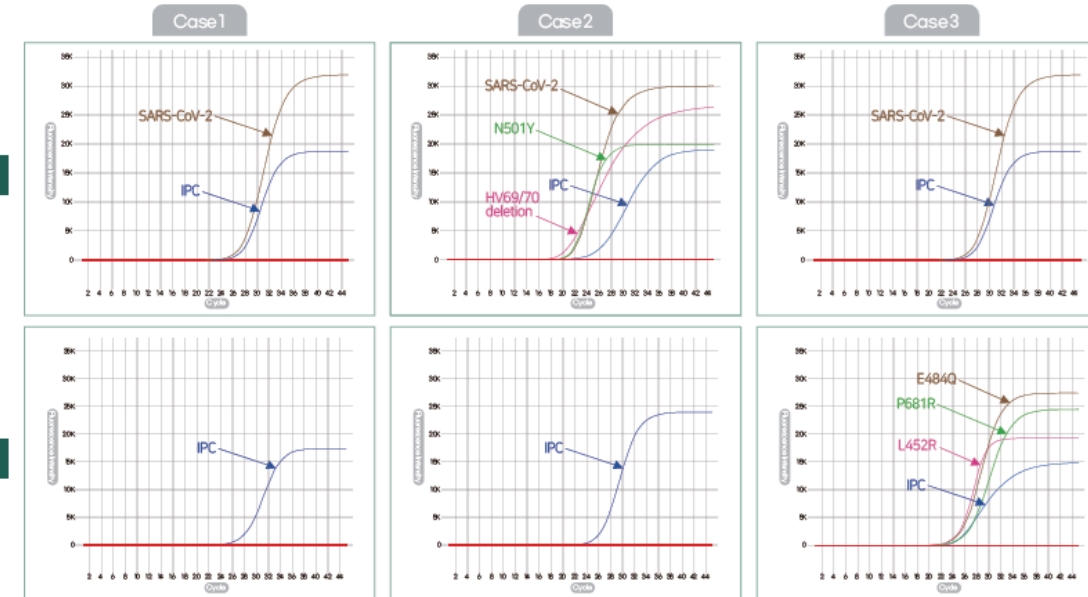


Variants 2

	Case 1	Case 2	Case 3
SARS-CoV-2	+	+	+
Variants ID	-	N501Y, H69/70 deletion, P681H	N501Y, K417N, E484K

• SARS-CoV-2 Variants ID2 Kit

Variants 1

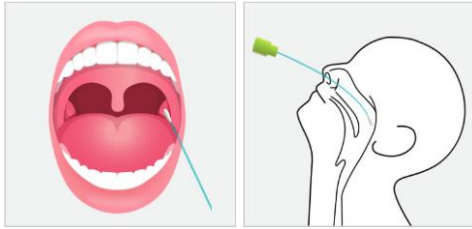


Variants 3

	Case 1	Case 2	Case 3
SARS-CoV-2	+	+	+
Variants ID	-	N501Y, H69/70 deletion	L452R, E484Q, P681R

Current Problems of Molecular Diagnosis

Sample collection



Prepare measures to prevent mutual infections that may occur in the process of waiting for an diagnosis

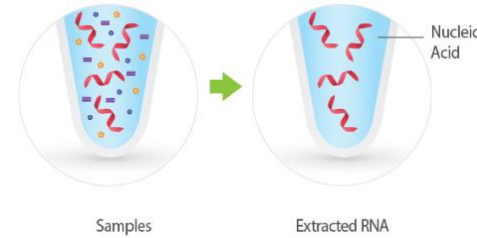
Walking Thru



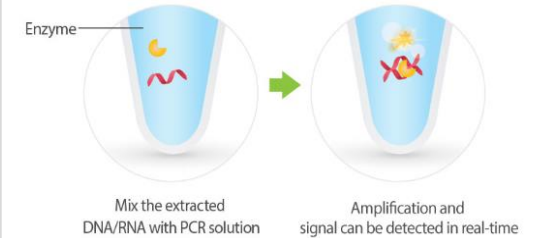
Drive Thru



NA Extraction



Real-Time PCR



After sample collection,
What are the problems that can occur during molecular diagnosis?

- ✓ **Lack of time and manpower** for a large number of sample tests
- ✓ **Risk of user error and secondary infection** during the inspection
- ✓ **Requires professional personnel and biosafety facilities** due to complex molecular diagnostic processes

New Paradigm for Point-of-Care System

IRON-qPCR™



- 01/ FULL AUTOMATION**
- Sample-In, Data-out
 - Built-in reagent cartridge

- 02/ RAPID DIAGNOSIS**
- Assay complete within 30min
 - Suitable for near patient diagnosis

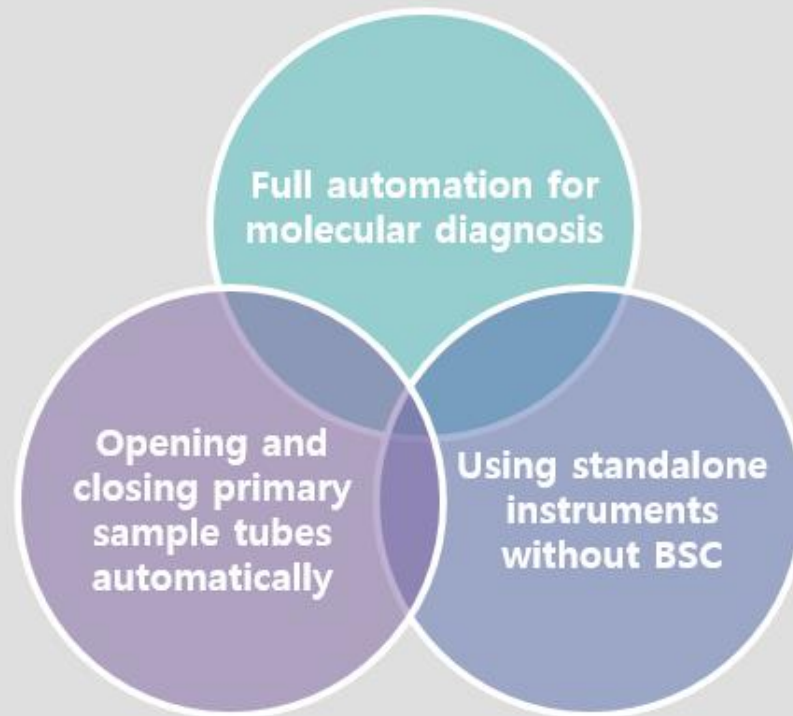
- 03/ USER-FRIENDLY**
- 2-cartridge type instrument & convenient operation with touch screen

- 04/ VARIOUS APPLICATION**
- Up to 40 pathogens at once for syndrome diagnosis
 - MDR/XDR multi-test Kit & AMR multi-test Kit*

*developing

The next generation of molecular diagnostic system

ExiStation™ 96FA



- ✓ Minimize sample contamination and human- errors
- ✓ Easy operation allows one-day training



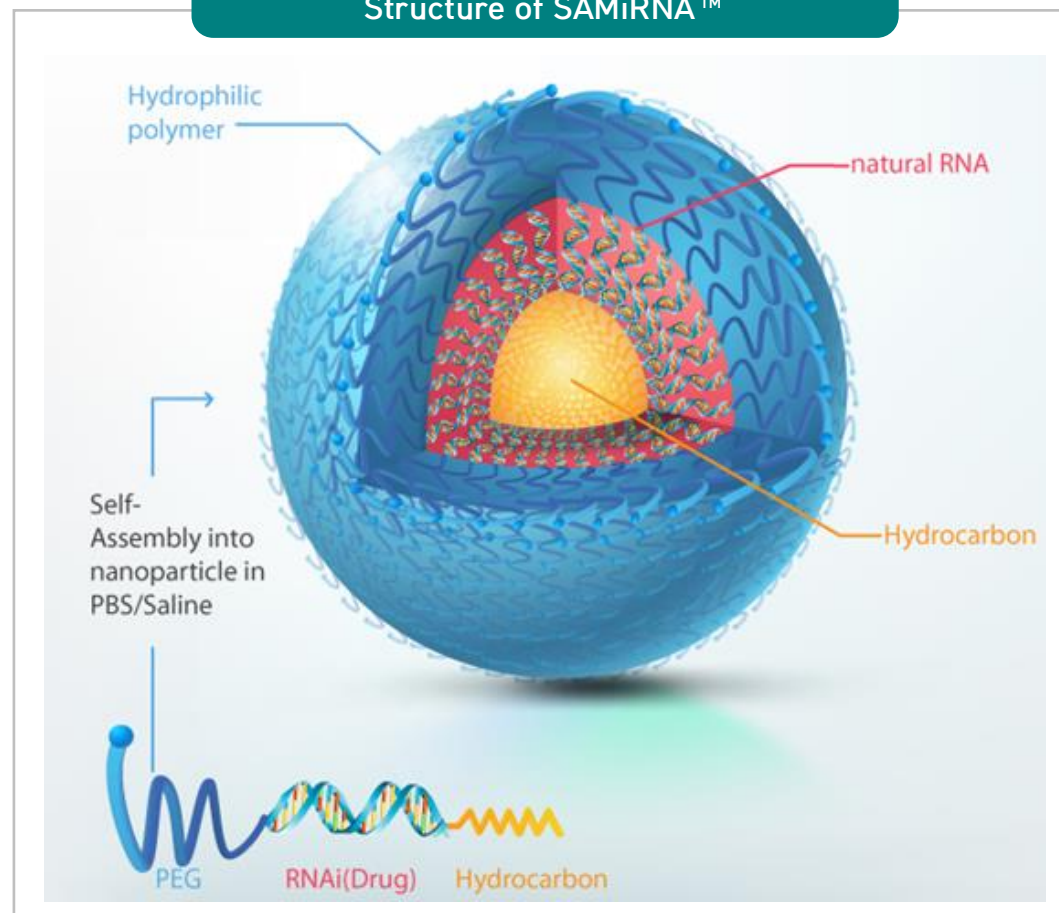


III. Growth Potential

SAMiRNA™ Solves the Unmet Needs in RNAi Drug Development

(Self-Assembled-Micelle-inhibitory-RNA)

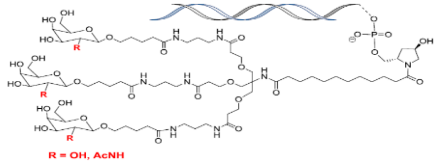
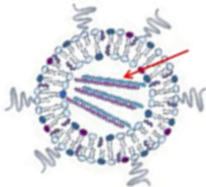
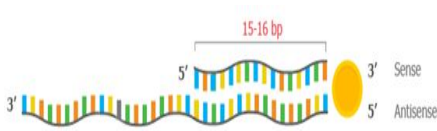
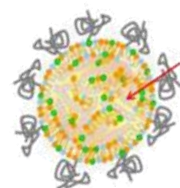
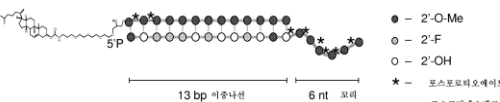
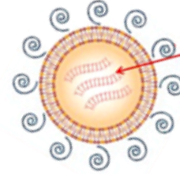
Structure of SAMiRNA™

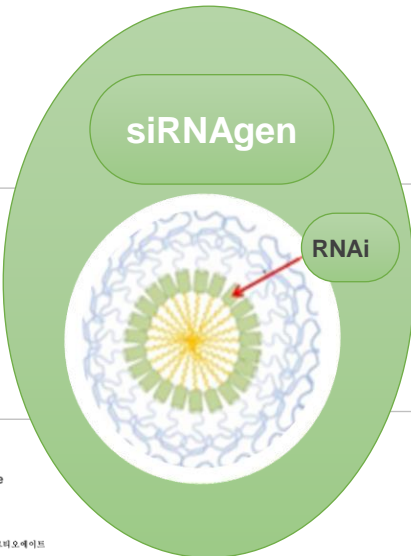


Summary of SAMiRNA™

- The world's first **siRNA prodrug** technology: highly stable in circulation and siRNA is released and active only within the target cells
- Conjugation of hydrophilic and hydrophobic substances to both ends of unmodified RNA (**No chemical modification of RNA**)
- **in vivo efficacy validated** in animal disease models via low dose I.V. injection
- Superb **serum stability** (PK/PD validated)
- Extremely **low toxicity** and cytokine induction
- Fully automated solid phase chemical synthesis of siRNA conjugates; **advantage of manufacturing & QC processes** for large scale production of siRNA drug
- Powerful siRNA delivery **platform technology**: Flexibility to incorporate siRNA sequences against any disease target
- Publication of related papers in the journal "Nature" on Jan. 11, 2021
<https://www.nature.com/articles/s41598-021-81726-2>

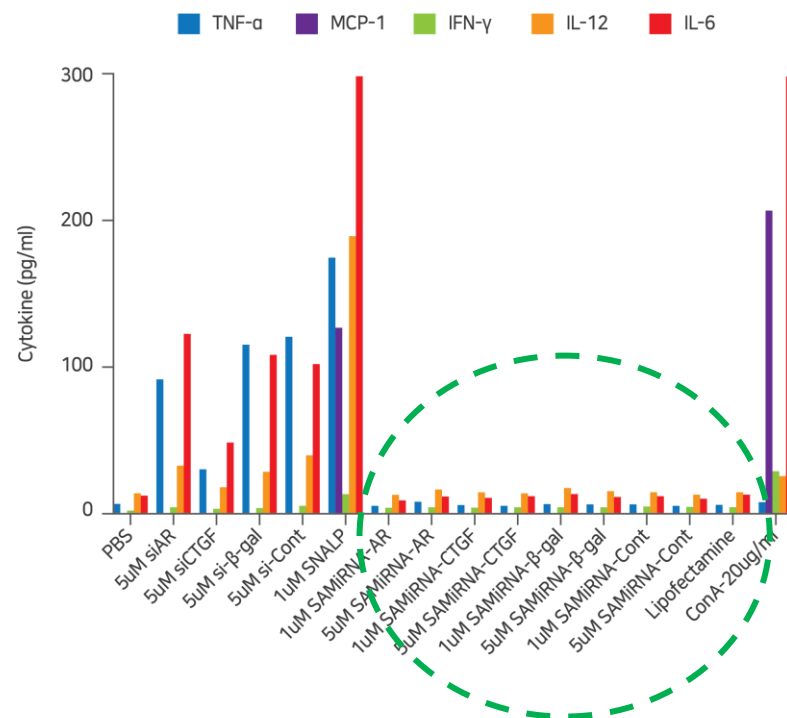
SAMiRNA™ is Simpler than Naked & Better Protected than LNP Without Causing Liposome-induced Innate Immune Reaction & Naked-lysis

Naked Oligo		Nanoparticle	
<p>Alnylam GalNAc-siRNA Conjugates</p>			<p>Alnylam</p>
<p>Olix Cell penetrating-long asymmetric siRNA (Cp-lasiRNA)</p>			<p>Dicerna</p>
<p>RXi self-delivering RNAi (sd-rxRNA®) : RNAi + Antisense</p>			<p>Tekmira</p>

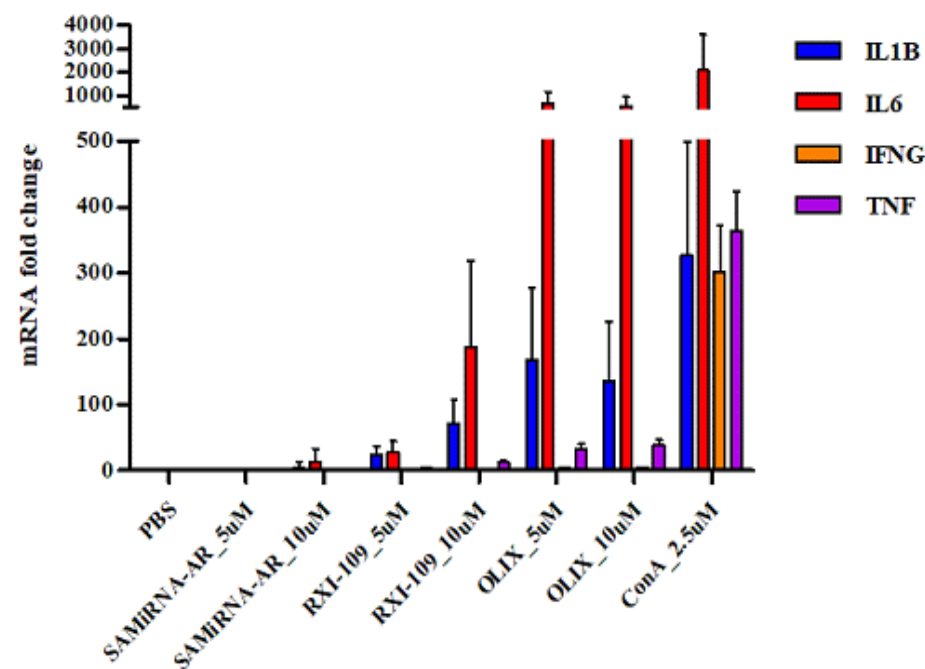


SAMiRNA™ Overcomes Innate Immune Toxicity

SAMiRNA™ treatment at 1- 5 uM on human PBMCs shows no innate immune stimulation.




SAMiRNA™ treatment up to 10 uM onto human PBMC shows no innate immune stimulation.



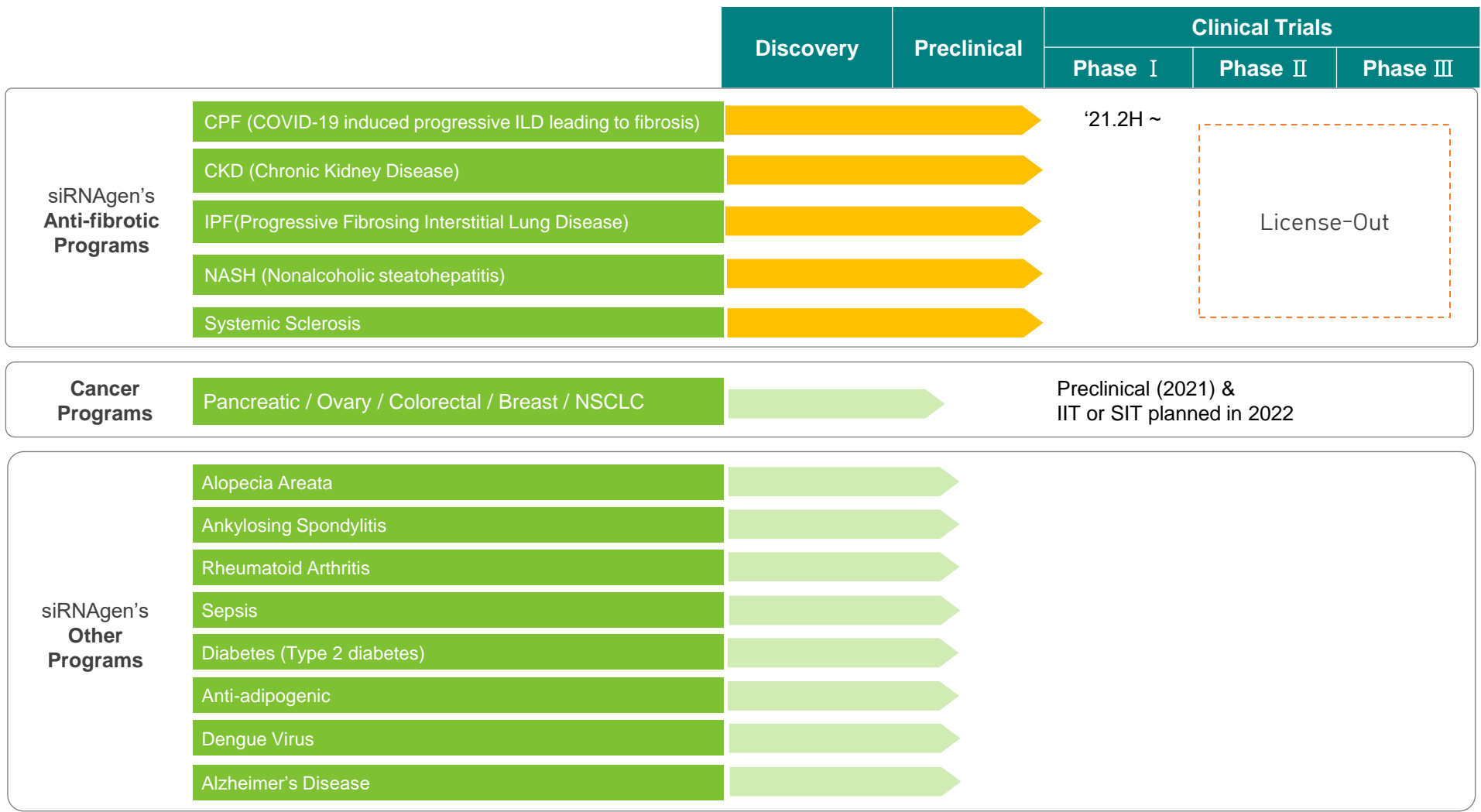
Measured by Magnetic Luminex Screening Assay (R&D systems, LXSAMSM)
J. Biol. Chem. 2016 Yoon et. al.

Pre-clinical Toxicology Studies of SAMiRNA-Areg

KIT(Korea Institute of Toxicology) and Charles River Laboratories

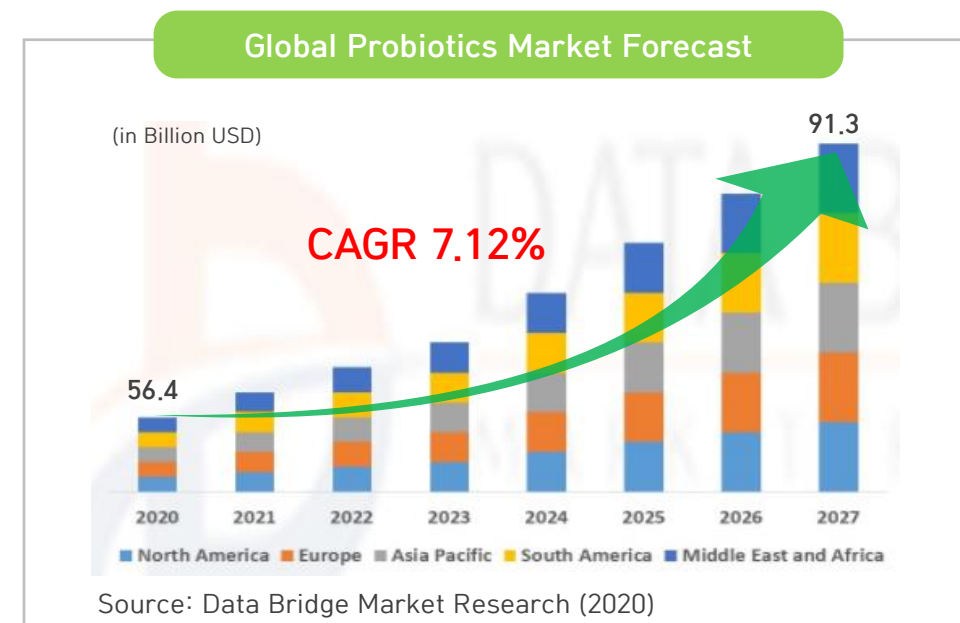
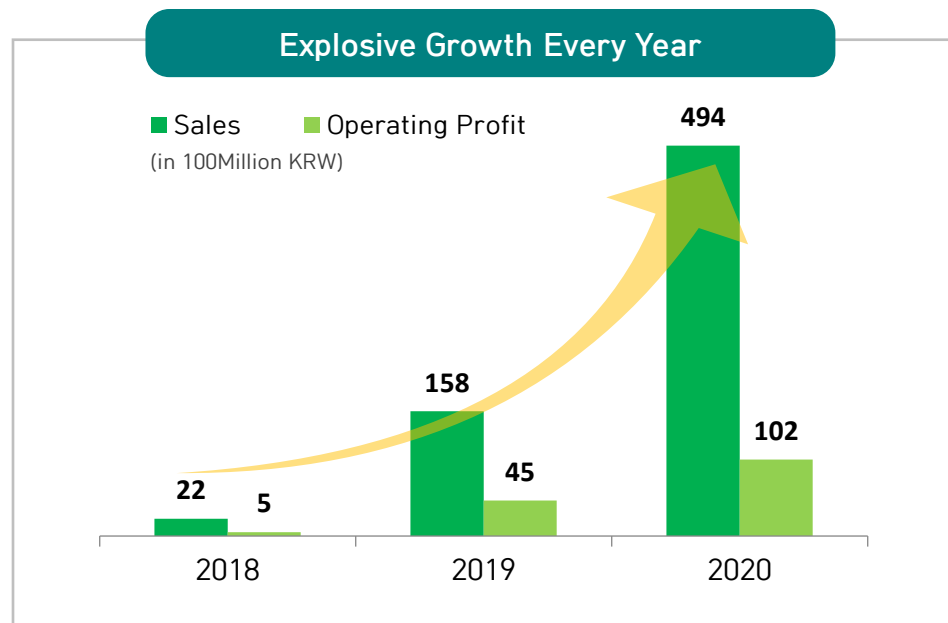
General Toxicology Study	Genetic Toxicology Study
<ul style="list-style-type: none"> • Mouse (NOAEL in mouse > 300mpk) • Acute toxicity, 2 Weeks Dose Range Finding(DRF), Repeated Dose 4-Week Toxicity and Toxicokineitc Study with a 2-Week Recovery Period ▶ I.V single administration of SAMiRNA was well-tolerated with no overt toxicity • Monkey (NOAEL in monkey > 100mpk) • Stepwise dose-escalating study, 2-Week Dose Range Finding, Repeated Dose 4-Week Toxicity and Toxicokineitc Study with a 2-Week Recovery Period ▶ No clinically significant or dose-dependent changes were observed ▶ SAMiRNA-AREG did not induce test item-related adverse effect ▶ SAMiRNA-AREG-related toxicological changes were not seen in all parameters 	<ul style="list-style-type: none"> • Mammalian Micronucleus Assay, <i>In Vitro</i> Chromosome aberration assay, Bacterial Reverse Mutation Assay ▶ SAMiRNA did not induce genetic toxicity
Safety Pharmacology Study	Cardiovascular monkey telemetry Study
<ul style="list-style-type: none"> • Irwin test, Respiratory test (Respiratory Function Study), hERG test : hERG Potassium Channel Preliminary Study ▶ SAMiRNA-AREG did not produce any significant effects 	<div>  </div> <ul style="list-style-type: none"> ▶ No effects in cynomolgus monkeys at doses of 25, 50, and 100 mg/kg ▶ NOAEL⁽¹⁾ of SAMiRNA was 100mg/kg in monkey <p>(¹) NOAEL : No Observed Adverse Effect Level</p>

After Phase 1 Clinical Trial, Finalizing the License-out Negotiations with Global Pharmaceutical Companies



Leading The Premium Probiotics Market and More than Double Growth Every Year

- Strong IP Portfolio : Patent registration and application in more than 20 countries around the world, including Korea, the United States, Europe, and Brazil
- Securing royalties by licensing out with UAS Labs, a subsidiary of Chr Hansen
- Signed an exclusive supply contract with Cristalia, a large pharmaceutical company in Brazil
- Securing sustainable growth momentum through strategic entry into the Chinese and Southeast Asian markets



Strengthening Global Competitiveness by Investing in Large-scale Production Facilities

Location	Daejeon, South Korea
Land Area	44,983 m ² (484,193 ft ²)
Building Area	43,014 m ² (463,000 ft ²)
Capacity	3.7 Million tests/week
Completion	2H 2021 (f)

36 Billion
in KRW



About 8 times increase
in nucleic acid
extraction kit

Mass production
of saliva sampling kit

Mass production of
next-generation
molecular diagnostic
platform

One-stop solution from
production to delivery
with our own fully
automated logistics center

Investment Background

As the global population increases and a super-aging society progresses, the prevalence of various diseases is increasing, and the proportion of prevention and diagnosis in the medical industry is continuously increasing due to changes in social and institutional perceptions. In addition, with Covid-19 as an opportunity, the molecular diagnostics market is expected to continue to grow even in the post Covid-19 era.

Strong and Diverse Patent Portfolios for Our Business Areas

Field	Contents	Domestic		Overseas	
		Applied	Registered	Applied	Registered
Oligo DNA/RNA Synthesis and Technology	<input type="checkbox"/> Dry oligonucleotide composition and preparation method <input type="checkbox"/> Use and manufacturing method of novel azo compounds etc	1	3	2	4
Developing New Drugs	<input type="checkbox"/> siRNA conjugates and preparation method <input type="checkbox"/> Drug discovery method using gene-defective fission yeast mutant strain	9	25	58	98
Functional Microorganisms	<input type="checkbox"/> Lactobacillus isolated from human breast milk with probiotic activity and weight gain inhibitory effect etc	-	3	2	10
Diagnostic Kit	<input type="checkbox"/> Stabilized dry composition for hot-start PCR <input type="checkbox"/> Primers and probes for diagnosing novel influenza A virus, kits including them, and diagnostic methods	3	36	4	39
Genetic Analysis System	<input type="checkbox"/> Real-time monitoring device for biochemical reactions <input type="checkbox"/> Automatic biological sample purification device equipped with a magnetic field applying unit, a method for extracting a target material from a biological sample, and a protein expression and purification method etc	11	22	37	102
Nano Technology	<input type="checkbox"/> Nanoporous membrane and manufacturing method <input type="checkbox"/> Low specific heat composite material for thermal cycler etc	4	21	18	38
Others	<input type="checkbox"/> Device for removing organic compounds in the air <input type="checkbox"/> A method for identifying an object containing nucleic acids etc	4	14	16	17
TOTAL		32	124	137	308



IV. Financial Highlights

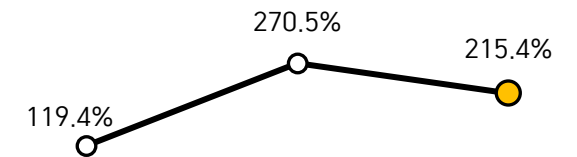
Summary of Financial Status

(K-IFRS Consolidated)

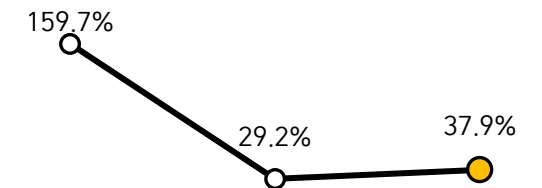
(in Million KRW)

Account	2019	2020	2021.1Q
Current Asset	43,023	95,059	129,860
(Cash & Cashable Asset)	5,942	33,667	41,408
Non-current Asset	39,077	96,107	95,036
(Tangible Asset)	31,842	83,012	81,654
TOTAL ASSETS	82,100	191,166	224,897
Current Liability	36,029	35,143	60,281
Non-current Liability	14,452	8,063	1,534
TOTAL LIABILITIES	50,481	43,206	61,815
Paid-in Capital	11,365	12,566	12,566
Capital Surplus	128,496	185,290	185,018
Retained Earnings	Δ 109,252	Δ 52,250	Δ 37,002
TOTAL EQUITY	31,619	147,960	163,081

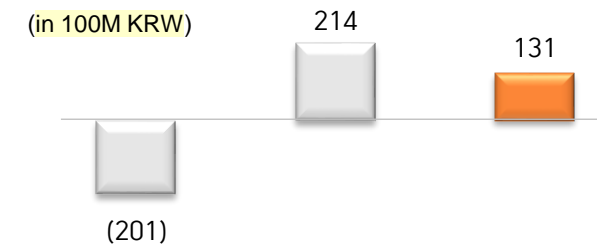
Current Ratio



D/E Ratio



Net Cash



Summary of Income Statement

(K-IFRS Consolidated)

(in Million KRW)

Account	FY 2020					FY 2021	
	1Q	2Q	3Q	4Q	Total	1Q	YoY
Sales Revenue	12,605	59,271	73,695	61,417	206,988	49,882	295.7%
Molecular Diagnostics	7,013	48,900	57,650	44,019	157,582	32,500	363.4%
Probiotics	5,592	10,371	16,045	17,398	49,406	17,382	210.8%
Gross Profit	7,503	47,406	59,583	48,094	162,586	37,515	400.0%
Operating Expenses	7,968	15,369	17,229	16,824	57,390	19,367	143.1%
Operating Profit	(464)	32,037	42,354	31,270	105,197	18,148	Turnaround
Molecular Diagnostics	(1,391)	30,847	38,623	26,846	94,925	15,978	Turnaround
Probiotics	927	1,190	3,731	4,424	10,272	2,170	134.1%
Non-operating Profit	(20,239)	9,399	(38,581)	(126)	(49,547)	2,128	Turnaround
Profit Before Income Tax	(20,703)	41,436	3,772	31,144	55,649	20,276	Turnaround
Net Profit	(20,834)	41,459	3,189	35,373	59,187	15,310	Turnaround
<i>Gross Profit Margin (GPM)</i>	59.5%	80.0%	80.9%	78.3%	78.5%	75.2%	+15.7%P
<i>Operating Profit Margin (OPM)</i>	-%	54.1%	57.5%	50.9%	50.8%	36.4%	Turnaround
<i>Net Profit Margin(NPM)</i>	-%	69.9%	4.3%	57.6%	28.6%	30.7%	Turnaround



Appendices

Appendix #1. Various Nucleic Acid Extraction Kit

Automatic Extraction

ExiPrep™ Dx Kit for ExiPrep™ 16Dx

- Viral DNA/RNA Kit
- Viral DNA Kit
- Viral RNA Kit
- Blood Viral DNA Kit
- Bacteria Genomic DNA Kit
- Mycobacteria Genomic DNA Kit
- Blood Genomic DNA Kit

ExiPrep™ 48 Kit for ExiPrep™ 48Dx

- Viral DNA/RNA Kit
- Viral RNA Kit
- Genomic DNA Kit

ExiPrep™ 96 Kit for ExiPrep™ 96 Lite

- Viral DNA/RNA Kit
- Genomic DNA Kit
- Blood Genomic DNA Kit
- cfDNA Kit



Manual Extraction

MagListo™ Kit

- Viral DNA/RNA Kit
- cfDNA Kit

AccuPrep® Kit

- Viral RNA Kit









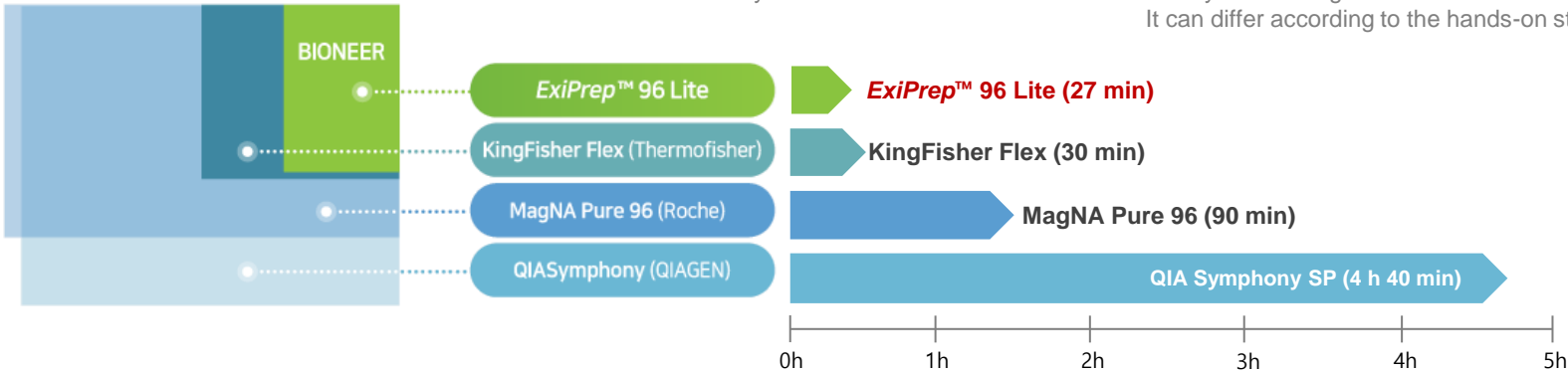
Wide range of kit for infectious diseases
Multiplex (max. 5-plex) kit for
syndromic diagnostics

COVID-19	<ul style="list-style-type: none">• COVID-19 (Master Mix & Premix)• COVID-19 & Inf A / B (Master Mix & Premix)	Human Papillomavirus	<ul style="list-style-type: none">• HPV 16&18 Kit• hrHPV Kit
Hepatitis & HIV Viral load test	<ul style="list-style-type: none">• HBV Kit• HCV Kit• HIV-1 Kit	Transplantation -related virus Quantification	<ul style="list-style-type: none">• CMV Kit• EBV Kit• BKV Kit
Tuberculosis	<ul style="list-style-type: none">• MTB Kit• MTB & NTM Kit• TB & MDR Kit• XDR-TB Kit	Gastro-intestinal Disease	<ul style="list-style-type: none">• Norovirus Kit• Enterovirus Kit
Sexually Transmitted Disease	<ul style="list-style-type: none">• STI 8A Kit (CT, NG, UU, MG)• STI 8B Kit (TV, MH, HSV1, HSV2)• STI 4C Kit (TP, UP, CA, GV)	Mosquito-borne Disease	<ul style="list-style-type: none">• ZIKV multiplex Kit (ZIKV, DENV, CHIKV)
		Respiratory Disease	<ul style="list-style-type: none">• InfA / New InfA Kit• CP Kit• MP Kit• MERS-CoV Kit

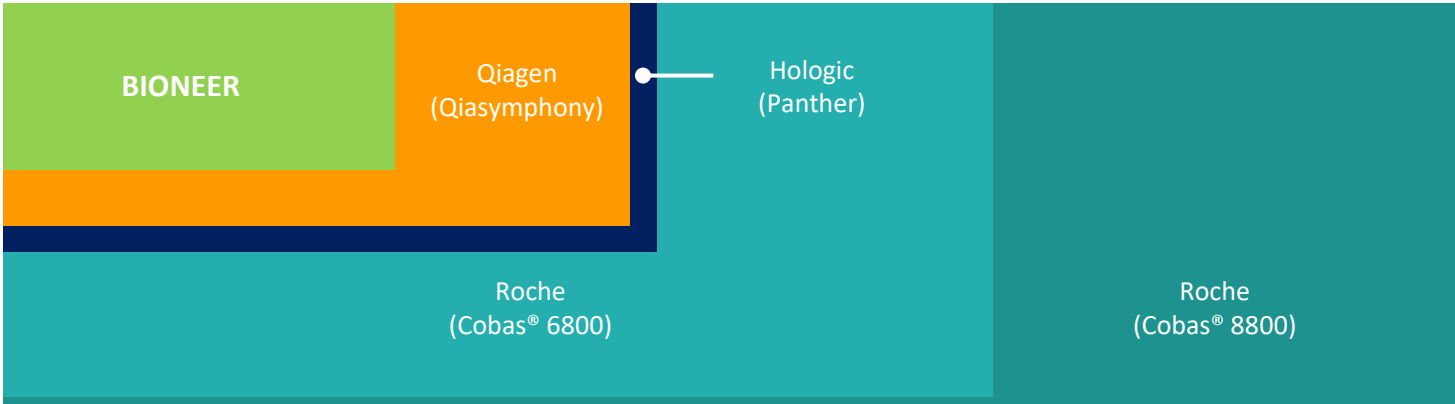
Appendix #3. *ExiPrep™* 96 Lite




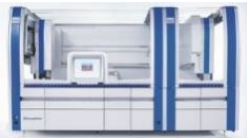

				
	BIONEER	ThermoFisher	Roche	Qiagen
Product	<i>ExiPrep™</i> 96 Lite	KingFisher Flex	MagNA Pure 96	QIASymphony SP
Daily test number*	1,728 tests/ 8hrs (5,184 tests/ 24hrs)	1,536 tests/ 8hrs (4,608 tests/ 24hrs)	480 tests/ 9hrs (1,536 tests/ 24hrs)	144 tests/ 9hrs (480 tests/ 24hrs)
Weekly test number* / Monthly test number*	36,288 tests(7 days) / 155,520 tests(30 days)	32,256 tests(7 days) / 138,240 tests(30 days)	10,752 tests(7 days) / 46,080 tests(30 days)	3,360 tests(7 days) / 14,400 tests(30 days)

* The daily test number was calculated based on only the running time of each instrument.
It can differ according to the hands-on step.



The smallest size, **BUT** the highest through-put



					
	BIONEER	Roche		Qiagen	Hologic
Product	2 ExiPrep™ 96 Lite + Exicycler™ 384	Cobas® 6800	Cobas® 8800	QiaSymphony	Panther
Daily tests number	1, 504tests/ 8hrs (4,136 tests/ 24hrs)	384 tests/ 8hrs (1,536/ 24hrs)	1,056 tests/ 8hrs (4,032 tests/ 24hrs)	144 tests/ 8hrs (480 tests/ 24hrs)	335 tests/ 8hrs (1,150 tests/24hrs)
Dimension (W x H x D)	115.5 x 57.5 x 54.6 cm	292 x 216 x 129 cm	429 x 216 x 129 cm	185 x 103 x 73 cm	193 x 175 x 81.5 cm

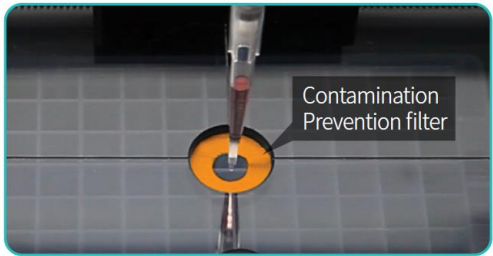
* Refer to brochure, manual, homepage contents and etc. of each products.

Guide for Dispensing the Samples in a Multi-Well Plate

AccuLoader™

Contamination prevention filter

During sample loading, the filter minimizes cross-contamination caused by tip contact.



User-Friendliness

Various loading conditions on AccuLoader App



Accurate Guide

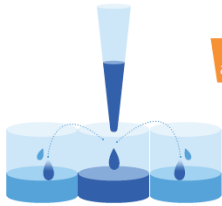
Automatic position with barcode scanner

Contamination shield

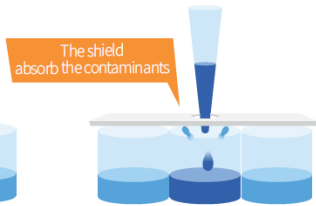
The contamination shield protects the samples from the splashes that may occur during the sample loading step.

Traditional methods

With AccuLoader™



High risk of cross-contamination



Minimize cross-contamination

AccuLoader™



Automatically reads the sample information in the barcode, and manages the information.

► Load a large number of samples quickly with minimal human errors and easily manage the sample information using the barcode scanner

Thank You !

