

**kuraray**

*Noritake*

# ULTRATHIN LAYERING. FUTUREPROOF YOUR LAB.

Low-fusing porcelains and internal stains for zirconia  
or lithium disilicate dental restorations



**CERABIEN  
Milai**



# OUTSTANDING AESTHETICS AT THE FIRST GO

CERABIEN™ MiLai is a set of porcelains and internal stains specifically designed for the micro-layering technique. The name “MiLai” is derived from the term “micro-layering” and the Japanese word “mirai” (which means future).

The innovative product based on synthetic feldspar enables dental technicians to add the final touch to their zirconia or lithium disilicate restorations in a simple and time-saving procedure – for outstanding aesthetics right from the start.





## FEATURES & BENEFITS

### 1 **COMPACT LINE-UP DESIGNED FOR MICRO-LAYERING**

for a minimized inventory, streamlined decision-making and a simple, efficient and economic finishing procedure

### 2 **LOW FIRING TEMPERATURE (740°C / 1,364°F)**

for compatibility with a broad range of restorative materials including zirconia and lithium disilicate\* and a simplified inventory management

### 3 **UNIQUE PORCELAIN PROPERTIES**

based on synthetic feldspar porcelain for consistent handling and excellent mechanical properties; multiple firing is possible

\*The material should have CTE value within  $9.5 \sim 11.0 \times 10^{-6}/K$  (50~500 °C)



# SIMPLIFYING PROCEDURES

## COMPACT LINE-UP DESIGNED FOR MICRO-LAYERING

Modern zirconia or lithium disilicate-based restorative materials have a high aesthetic potential, so that a comprehensive reduction and adding of multiple layers of porcelain is usually no longer required.

Instead, a monolithic design or small up to 0.5 mm (vestibular) cut-back is performed, and the dental technician may add a thin layer of porcelain to obtain the effects typical for natural enamel. This procedure is referred to as MICRO-LAYERING – a simplified layering approach leading to beautiful outcomes.





# 16 PORCELAINS

The line-up of CERABIEN™ MiLai has been designed to fulfill the needs of dental technicians preferring this simplified, efficient and economic finishing approach. It consists of 16 porcelains and 15 internal stains easy to select and manage. For additional shade effects, a mixing of the porcelains is possible\*.

\* Mixing with other CERABIEN™ MiLai porcelain shades is possible.  
Do not mix with any porcelains from other porcelain series or porcelains from other manufacturers.

# PLENTY OF CHOICES

# 740 °C

## LOW FIRING TEMPERATURE

The firing temperature of CERABIEN™ MiLai porcelains and internal stains is lower than that of CERABIEN™ ZR porcelains **(740 °C / 1,364 °F versus 930 °C / 1,706 °F).**

This feature makes CERABIEN™ MiLai the go-to solution for the finishing of oxide ceramic (e.g. zirconia) and silicate ceramic\* (e.g. lithium disilicate) restorations. With fewer lines of porcelain needed, the porcelain inventory is reduced further and fewer decisions need to be taken.

If desired, CERABIEN™ MiLai porcelains and internal stains may even be applied on top of CERABIEN™ ZR, as the lower firing temperature does prevent any deformations in the existing porcelain work.



# BAKING SCHEDULE

	DRY-OUT TIME	PREDRYING TEMPERATURE	START VACUUM	HEAT RATE	VACUUM LEVEL	RELEASE VACUUM	HIGH TEMPERATURE	HOLD TIME IN THE AIR	COOL TIME
	MIN.	°C / °F	°C / °F	°C / °F PER MIN.	kPa	°C / °F	°C / °F	MIN.	MIN.
Wash Bake	5	500 °C 932 °F	600 °C 1,112 °F	45 °C 81 °F	96	740 °C 1,364 °F	740 °C 1,364 °F	1	4
Internal Stain	5	500 °C 932 °F	-	45 °C 81 °F	0	-	700 °C 1,292 °F	-	4
Liner/Enamel/ Translucent/ Luster/Clear Cervical	7	500 °C 932 °F	600 °C 1,112 °F	45 °C 81 °F	96	740 °C 1,364 °F	740 °C 1,364 °F	1	4
Minor Adjustment	5	500 °C 932 °F	600 °C 1,112 °F	45 °C 81 °F	96	730 °C 1,346 °F	730 °C 1,346 °F	0.5	4
Tissue	5	500 °C 932 °F	600 °C 1,112 °F	45 °C 81 °F	96	720 °C 1,328 °F	720 °C 1,328 °F	1	4
Self Glaze	5	500 °C 932 °F	-	45 °C 81 °F	0	-	710 °C 1,310 °F	-	4
CERABIEN™ ZR FC Paste Stain	5	500 °C 932 °F	600 °C 1,112 °F	45 °C 81 °F	96	730 °C 1,346 °F	730 °C 1,346 °F	1	4

The above program is only a guideline.  
Baking temperature may be varied with the peculiarities of different furnace.  
Porcelain furnace temperature variations may be significant in the lower  
ranges. Determine the exact baking schedule by making a preliminary test  
before baking an actual case restoration.

# COLOURS

CERABIEN™ MiLai line-up  
and colour combination table

## ENAMEL SURFACE

### **Tx**

Add high translucency to the enamel surface

### **ELT1**

Add brightness to your bleached restorations

### **LTx**

Add high translucency and opalescence to the enamel surface

### **LT1**

Add standard translucency and opalescence to the enamel surface

### **Creamy Enamel**

Add brightness to the enamel surface

## ENAMEL SURFACE

### INCISAL EFFECT

#### **LT Super Gray**

Optimise the incisal area of your middle-aged patients' restorations

#### **LT Royal Blue**

Add a strong bluish effect to the incisal area

#### **Aqua Blue 2**

Optimize the incisal area of your young patients' restorations

### CERVICAL EFFECT

#### **CCV-2**

Individualise the cervical area

## TISSUE

### **Tissue 1**

Individualize large gingival areas

### **Tissue 4**

Individualize large gingival areas

### **Tissue 5**

Add opacity and adjust the value for the inner part of the gingival tissue

### **Tissue 6**

Individualize large gingival areas

## INCISAL DENTIN SURFACE

### **E<sub>2</sub>**

Add translucency to the dentin structure

## VALUE CONTROL

### **Value Liner 1**

Increase the value of your lithium disilicate restorations

### **Value Liner 2**

Increase the value and chroma of your lithium disilicate restorations



# INTERNAL STAIN

## ENAMEL

**Gray**

**Incisal Blue 1**

**Incisal Blue 2**

## DENTIN

**Mamelon Orange 2**

**Cervical 2**

**A<sup>+</sup>**

**B<sup>+</sup>**

## TRANSLUCENT EFFECT

**Translucent effect**

**Bright**

## ADJUSTMENT & ENHANCEMENT

**White**

**Blue**

**Yellow**

**Salmon Pink**

## TISSUE

**Tissue Pink**

**Tissue Red**

# PREDICTABILITY

## UNIQUE PORCELAIN PROPERTIES

CERABIEN™ MiLai, like all other porcelains from Kuraray Noritake Dental Inc., is based on synthetic feldspathic porcelain technology developed by Noritake Dental Supply Co., Limited in the late 1980s. Its material structure and particle distribution resemble those of natural teeth.

**Multiple firing is possible without affecting the material’s properties.** Because of this quality, dental professionals can rely on persistent handling properties and predictable results every time.

## FLUORESCENCE

CERABIEN™ MiLai porcelain is fluorescent, mimicking the optical properties of a natural tooth. This adds to the vitality and life-like appearance of a restoration. Only Tissue shades do not have the same fluorescent properties, as natural gingiva is not fluorescent.

DAYLIGHT CONDITION



UNDER ULTRA VIOLET LIGHT



Tissue shades



# A SOLID FOUNDATION

## KATANA™ Zirconia MULTI-LAYERED SERIES

Looking for a base material from the same manufacturer? All materials from the KATANA™ Zirconia Multi-Layered Series complement micro-layering with CERABIEN™ MiLai porcelains and internal stains offering a strong, aesthetic and enduring base. They are available with colour gradation and uniform translucency and flexural strength of various levels (KATANA™ Zirconia UTML, STML and HTML PLUS) or with colour, translucency and flexural strength gradation (KATANA™ Zirconia YML).



### UTML

#### Ultra Translucent Multi-Layered

Translucency\* 51 %

Strength\* 557 MPa



### STML

#### Super Translucent Multi-Layered

Translucency\* 49 %

Strength\* 748 MPa



### HTML PLUS

#### High Translucent Multi-Layered

Translucency\* 45 %

Strength\* 1150 MPa

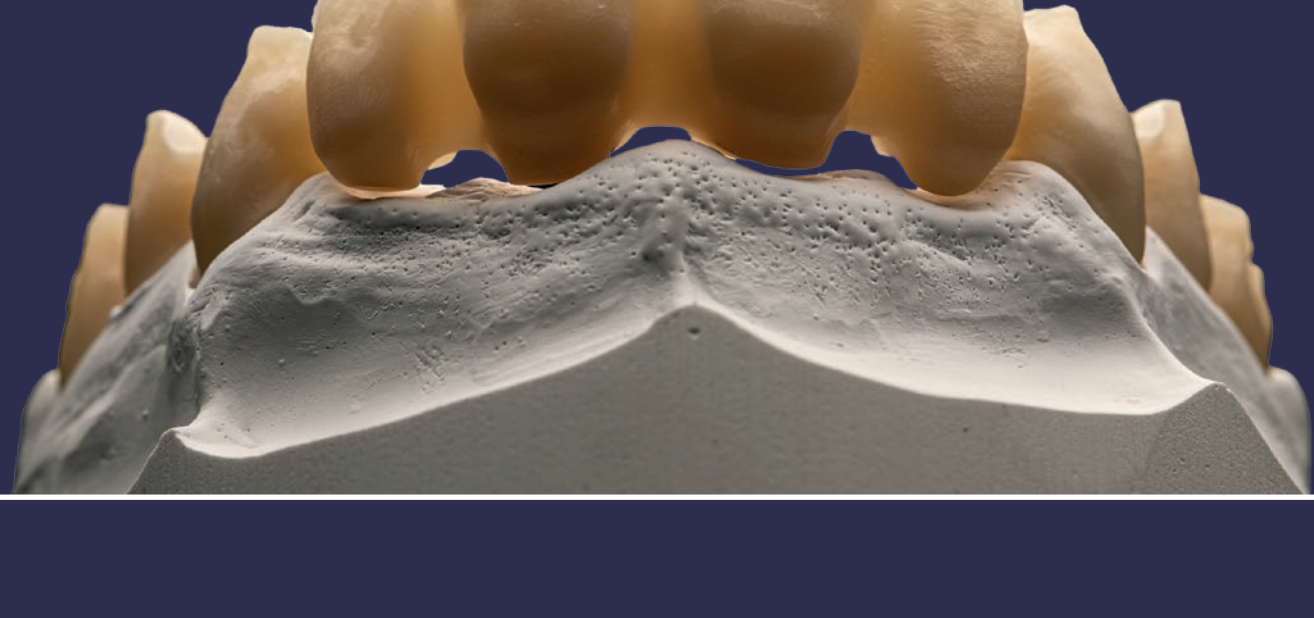


### YML

#### Yttria Multi-Layered

Translucency\* 45-49 %\*\*

Strength\* 750-1100 MPa\*\*



\*Measurement condition: Evaluated by base material (white colour)

1 According to ISO 6872: 2015, Sample size: 3 x 4 x 40 mm,

2 All light transmittance, illuminant: D65, Thickness of sample: 1.0 mm

\*\*Translucency and strength vary depending on layers.

Data source: Kuraray Noritake Dental Inc.



# PRODUCT ASSORTMENT



## **CERABIEN™ MiLai PORCELAIN 10g**

109-0051EU Tx  
109-0061EU ELT1  
109-0071EU LTx  
109-0081EU LT1  
109-0091EU LT Super Gray  
109-0101EU LT Royal Blue  
109-0111EU Aqua Blue 2  
109-0121EU Creamy Enamel  
109-0131EU E2  
109-0141EU CCV-2  
109-0151EU Tissue 1  
109-0161EU Tissue 4  
109-0171EU Tissue 5  
109-0181EU Tissue 6  
109-0191EU Value Liner 1  
109-0201EU Value Liner 2



## **CERABIEN™ MiLai PORCELAIN 50g**

109-0212EU Tx  
109-0222EU ELT1  
109-0232EU LTx  
109-0242EU LT1  
109-0252EU LT Super Gray  
109-0262EU LT Royal Blue  
109-0272EU Aqua Blue 2  
109-0282EU Creamy Enamel  
109-0292EU E2  
109-0302EU CCV-2  
109-0312EU Tissue 1  
109-0322EU Tissue 4  
109-0332EU Tissue 5  
109-0342EU Tissue 6  
109-0352EU Value Liner 1  
109-0362EU Value Liner 2



## **CERABIEN™ MiLai INTERNAL STAIN 3g**

109-0371EU White  
109-0381EU Gray  
109-0391EU Incisal Blue 1  
109-0401EU Incisal Blue 2  
109-0411EU Blue  
109-0421EU Yellow  
109-0431EU Mamelon Orange 2  
109-0441EU Cervical 2  
109-0451EU Salmon Pink  
109-0461EU Tissue Pink  
109-0471EU Tissue Red  
109-0481EU A+  
109-0491EU B+  
109-0511EU Fluoro  
109-0501EU Bright

211-2599EU CERABIEN™ MiLai  
INTERNAL STAIN COLOR GUIDE



CERABIEN  
**MiLai**

KITS



109-0010EU

CERABIEN™ MiLai MICRO-LAYERING KIT



109-0020EU

CERABIEN™ MiLai INTERNAL STAIN KIT



- Before using this product, be sure to read the Instructions for Use supplied with the product.
- The specifications and appearance of the product are subject to change without notice.
- Printed color can be slightly different from actual colour.

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