COMPOSITE TOTALJOIST

A SUPERIOR CONCRETE FLOORING SYSTEM

iSPAN SYSTEMS
COMPOSITE TOTALJOIST HAS BEEN USED ON PROJECTS OF ALL SIZES AND COMPLEXITIES BY LEADING DEVELOPERS AND ARCHITECTS.

AC HOTEL BY MARRIOTT
Dublin, Ohio

DOGHOUSE HOTEL
Canal Winchester, Ohio

HATCHER RESIDENCE
Burlington, Ontario

THE GARDENS BY MARANATHA
Burlington, Ontario

VIEVA INC. MEZZANINE
London, Ontario

HAWTHORNE SOUTH VILLAGE
Milton, Ontario

ARCH LOFTS
Toronto, Ontario

MID-TOWN LOFTS
Kitchener, Ontario
Composite TotalJoist dramatically increases design and building options while also delivering a durable, high quality flooring system. Given the quick and easy installation of Composite TotalJoist, owners and developers can compress their construction schedule to start generating a return on their investment faster.

**IDEAL FOR MID-RISE CONSTRUCTION**
Composite TotalJoist is great for all support conditions including block, ICF, cold-formed steel, wood and structural steel.

**A SOLID, STABLE FLOOR**
With stay-in-place formwork, Composite TotalJoist combines the benefits of our TotalJoist system with Total-Lewis-Deck and concrete, to create a premium concrete floor system that is stable and feels solid.

TotalJoist is our patented steel floor joist. Total-Lewis-Deck is a dovetail shaped deck with embossed ribs. It forms a very strong, permanent bond with the concrete poured onto it, and acts as reinforcement for the slab.
KEY BENEFITS

VIBRATION CONTROL
Every flooring system is reviewed with our proprietary design method to ensure great feeling floors.

HIGH ACOUSTIC RATINGS
Helps minimize the #1 reason for complaints of multi-family living: noise. 60% higher ratings than precast and over 34% higher ratings than wood and gypcrete with reduced sound flanking.

HIGH FIRE RATINGS
Made with non-combustible materials. 2 hr UL/ULC rating with only one layer of drywall.

NO SHORING OR TEMPORARY FORMWORK REQUIRED
Pre-cambered joists eliminate the need for shoring during concrete topping pour. Steel decking as stay-in-place formwork reduces the schedule by eliminating the need to place and tear down formwork.

EASE OF INSTALLATION
Pre-engineered components can be installed quickly and easily without the need for specialized trades.

ACCOMMODATES FLOORING SYSTEMS
Allows for polished concrete and in-floor heating systems. Total-Lewis-Deck naturally drives heat upward for in-floor applications, increasing efficiency of your heating system.

ELIMINATES BULKHEADS
Removing unsightly and costly bulkheads creates a more modern and spacious feeling interior.

LIGHTWEIGHT AND DURABLE
Made from lightweight steel, our system is 50% less weight than precast with a 100-year+ life expectancy. Offers superior structural integrity in all environments.

PRE-CUT SERVICE HOLES
Large, pre-cut access holes allow trades (mechanical, electrical, plumbing) to run services easily.

NO WIRE MESH REQUIRED WHEN FIBRE MESH USED
Eliminate the labour and safety concerns of welded wire mesh by incorporating macro synthetic fibres into the concrete. No other reinforcing is required.

AVAILABLE IN MULTIPLE DEPTHS
Composite TotalJoist is available in 8” to 18” depth.

APPROVALS
2 hr UL/ULC Rating with one layer of drywall and has received an ICC-ESS evaluation report.
**SUPERIOR ACOUSTIC RATINGS**

60% higher ratings than precast and over 34% higher ratings than wood and gypcret with reduced sound flanking.

---

**UNMATCHED SPANS OFFER DESIGN FLEXIBILITY**

Composite TotalJoist with 3” Concrete Slab, Residential Loading | Vibration Controlled

<table>
<thead>
<tr>
<th>Depth (inches)</th>
<th>ISPAN® Joist</th>
<th>OPEN AREAS—NO PARTITIONS</th>
<th>FULL HEIGHT PARTITIONS</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>40psf Live Load / 25psf Superimposed Dead Load</td>
<td>40psf Live Load / 25psf Superimposed Dead Load</td>
</tr>
<tr>
<td></td>
<td></td>
<td>24” o.c.</td>
<td>30” o.c.</td>
</tr>
<tr>
<td>8”</td>
<td>8-ic-3</td>
<td>18’ 4”</td>
<td>17’ 5”</td>
</tr>
<tr>
<td>10”</td>
<td>8-ic-4</td>
<td>19’ 2”</td>
<td>18’ 4”</td>
</tr>
<tr>
<td>12”</td>
<td>10-ic-3</td>
<td>20’ 6”</td>
<td>19’ 5”</td>
</tr>
<tr>
<td></td>
<td>10-ic-4</td>
<td>21’ 7”</td>
<td>20’ 5”</td>
</tr>
<tr>
<td>14”</td>
<td>12-ic-3</td>
<td>22’ 11”</td>
<td>21’ 8”</td>
</tr>
<tr>
<td></td>
<td>12-ic-4</td>
<td>24’ 1”</td>
<td>22’ 10”</td>
</tr>
<tr>
<td>16”</td>
<td>14-ic-3</td>
<td>25’ 1”</td>
<td>23’ 8”</td>
</tr>
<tr>
<td></td>
<td>14-ic-4</td>
<td>26’ 7”</td>
<td>25’ 0”</td>
</tr>
<tr>
<td>18”</td>
<td>16-ic-3</td>
<td>27’ 6”</td>
<td>25’ 1”</td>
</tr>
<tr>
<td></td>
<td>16-ic-4</td>
<td>29’ 1”</td>
<td>27’ 5”</td>
</tr>
<tr>
<td>20”</td>
<td>18-ic-4</td>
<td>31’ 8”</td>
<td>29’ 10”</td>
</tr>
</tbody>
</table>

**NOTES**

1. Spans have been based on review for Strength, Deflection, Vibration, and Construction Loads.
2. See full Composite TotalJoist load tables on-line for complete notes regarding the criteria assumed.
3. For vibration, Full Height Partitions in the spans charts are assumed to be non-load bearing but they will have significant impact on the spans as shown.
4. Joists are assumed to be supported by walls at each end.
5. Floors do not require shoring during construction.
6. Dead loads shown are superimposed and are in addition to the self weight of the floor.
7. Tables are meant as a guide only. Contact ISPAN Systems for further analysis regarding increasing spans, different boundary conditions, slab thickness, etc.
COULD COMPOSITE TOTALJOIST BE RIGHT FOR YOUR NEXT PROJECT?

We’d be happy to provide more information about our systems, answer questions, or review drawings for your upcoming project.

Dwayne Van Harberden  
Vice President & General Manager  
519-458-4222 Ext 104  
dwaynevh@ispansystems.com

Dwayne Schaus  
Director of Sales  
519-458-4222 Ext 103  
dwaynes@ispansystems.com

70 Brentwood Drive  
Princeton, ON NOJ 1VO Canada

(519) 458-4222  
(519) 458-4460  
sales@ispansystems.com